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Genus-Group Names of Bees and Supplemental Family-Group Names¹

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ABSTRACT This paper includes an alphabetical list of generic and subgeneric names that have been proposed for bees, with bibliographic references and indications of type species. Synonymies are not indicated, but the major group (family, subfamily, tribe or sometimes merely "fossil") is indicated for each. Synonymies will be indicated in a future account of world bees. New nomenclatural details include the following: *Apis thoracica* Fabricius designated as type species of *Melandrena* Pérez; *Paracella* new subgenus of *Megachile*, with *M. semivenusta* Cockerell as type species, for *Paracella* Pasteels, a name proposed without designation of a type species; *Callistochlora* new name for *Callochlora* Moure, 1964, not Packard, 1864; *Gyrodromella* new name for *Gyrodroma* Thomson, 1872, not Klug, 1807; and *Lithurgus* Berthold, 1827, given preference over the French vernacular *Lithurge* Latreille, 1825. The list of family-group names in bees is corrected and up-dated.

Key words: Apoidea; Generic and Family names; Type species.

¹ Contribution Number 3167 from the Snow Entomological Division Natural History Museum, and Department of Entomology, The University of Kansas





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ABSTRACT This paper includes an alphabetical list of generic and subgeneric names that have been proposed for bees, with bibliographic references and indications of type species. Synonymies are not indicated, but the major group (family, subfamily, tribe or sometimes merely "fossil") is indicated for each. Synonymies will be indicated in a future account of world bees. New nomenclatural details include the following: *Apis thoracica* Fabricius designated as type species of *Melandrena* Pérez; *Paracella* new subgenus of *Megachile*, with *M. semivenusta* Cockerell as type species, for *Paracella* Pasteels, a name proposed without designation of a type species; *Callistochlora* new name for *Callochlora* Moure, 1964, not Packard, 1864; *Gyrodromella* new name for *Gyrodroma* Thomson, 1872, not Klug, 1807; and *Lithurgus* Berthold, 1827, given preference over the French vernacular *Lithurge* Latreille, 1825. The list of family-group names in bees is corrected and up-dated.

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INTRODUCTION

The last list of genus-group names of bees was that of Sandhouse (1943). Since that time many new taxa have been described; there were about 977 entries in her list, compared with about 2057 herein. It is of some interest to examine the entire list from the viewpoint of production of genus-group names or actual entries in the list, including nomina nuda and the like. From the initiation of Linnaean nomenclature until the end of 18th Century, five generic names were proposed for bees, *Andrena*, *Apis*, *Eucera*, *Hylaeus*, and *Nomada*. But for the first decade of the next century, 1800 to 1809, there are 66 entries. The result of a tabulation by decade, from 1800 to the present, is shown in Table 1. In a reevaluation in preparation, I expect to recognize about 867 genera and subgenera.

Melittologists are sometimes criticized for the extensive use of subgenera, because species-groups, named informally with species names, could be used instead of subgenera. Such a procedure would avoid burdening the literature with numerous subgeneric names with their associated formalities such as type species, problems of homonymy, etc. Such a criticism is justified for certain groups of bees, especially in certain regions of the world.

I believe strongly, however, that large genera are commonly practical and desirable. Nearly all biologists have some idea of what is meant by generic names like Drosophila, Culex, and Anopheles, and many would recognize major bee genera like Andrena or Megachile. If the subgenera of each of these were elevated to generic rank, the average biologist would often lose track of the sort of organism involved. For many large genera with hundreds or thousands of species, the choice is not between recognizing the genus with subgenera vs. the genus with species groups. It is between recognizing the genus with subgenera vs. several or many genera, because many of the current subgenera are quite different from one another, sometimes recognizable in flight, and many specialists prefer to recognize them as genera. I prefer to retain inclusive genera, for the reason indicated above. These decisions, however, are subjective regardless of one's views on systematic methodology. Some recent bee specialists have used generic names in much the same way that I would use tribal names. More, however, split "excessively," Robertson (1918b) being one of the first to be overtly and purposely a "splitter."

One of the advantages of subgenera is that they need not be cited, i.e., unlike genera, which are required, they

Decade	Number of names	Decade	Number of names	
1800-09	66	1900-09	232	
1810-19	11	1910-19	115	
1820-29	26	1920-29	92	
1830-39	16	1930-39	153	
1840-49	24	1940-49	150	
1850-59	48	1950-59	167	
1860-69	25	1960–69	281	
1870-79	39	1970-79	141	
1880-89	46	1980-89	210	
1890-90	125	1990–96*	82	

Table 1. Genus-group names proposed for bees, by decade.

*Note that this covers only the period 1990–1996.

are optional parts of scientific names of organisms. Thus *Megachile (Eutricharaea) rotundata* can also be written *Megachile rotundata*. Anyone who wishes can simply ignore subgeneric names. It is fortunate that much of the activity of excessive splitters can therefore be ignored by those who wish to do so; this is more difficult when the taxa are called genera.

The section on family-group names is a supplement to an earlier account (Michener, 1986a) that dealt with the authorship and dating of names proposed from the subtribal to superfamily level. This section is limited to new names, proposed since 1986, and corrections relating to older names.

Abbreviations used are as follows: Code = International Code of Zoological Nomenclature; Commission = International Commission on Zoological Nomenclature.

ACKNOWLEDGMENTS

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GENUS-GROUP NAMES

In this section, genus-group names are listed with authors, dates, and pages of publication, thus references to the Literature Cited. The type species and manner of designation of each are then indicated, including the bibliographic references in all cases of subsequent designation. Of course I have tried to list the earliest such type designation.

nation in each case; later type designations, sometimes not distinguishable from mere listing of the type species, have no nomenclatural significance and may have been missed or ignored. If a name was originally proposed as a subgenus, the genus under which it was placed is indicated in square brackets. Finally, for convenience of users, the cur-

rent tribe, subfamily, or family name is provided (in bold-face type) for each entry, following the classification put forward by Roig-Alsina and Michener (1993) and Alexander and Michener (1995).

I have cited the names of type species in their original combinations. This means that I have ignored the complexities that could have been cited when an author, in designating a type species, placed it in a genus different from the original one or cited an erroneous author. This policy is generally in accord with the Code, ed. 3, Art. 67d, f.

Of course there have been errors, especially probable printers' errors, from time to time. For example, Westwood (1840a) published *Caelioxys* instead of *Coelioxys*. Except when such errors have been repeated or have nomenclatural significance, I have not listed them. Also, nomina nuda that have not been recognized as relating to a particular taxon are omitted.

I follow Sandhouse (1943) in using the term monobasic to indicate that there was only one originally included species, and autobasic to mean that a replacement name automatically has the same type species as its antecedent, usually preoccupied, name. When a genus is monobasic and in the original publication the single species was also designated as the type species, I use only the expression "by original designation," since the positive action by the author of the name seems more significant than the mere fact that there was but one originally included species.

Sandhouse (1943) used the term isogenotypic for taxa having the same type species. Since genotype is no longer used to mean the type species of a genus, I have changed the term to isotypic. When two generic names are isotypic, they are objectively synonymous. Isotypic by synonymy, however, means that the taxa are the same only by synonymy of their type species, which is usually subjective. The synonymy of such generic names therefore may depend on the accuracy of the synonymy of the type species.

Sandhouse repeatedly cited "Blanchard, 1849" as a source of type designations. Thanks to Cowan, 1976 (see Blanchard, 1845–1849), we now know that the parts of this work (Cuvier's Disciples' edition) on bees were published in 1845, 1846, and 1847. When I first examined it, I concluded that this work did not contain type designations although a single species was listed for each genus in the explanations of the plates. However, as pointed out to me by Dr. D. B. Baker, the title page contains in small type, the notation "accompagné de planches gravées, représentant les types de tous les genres,...." Thus, types were designated, but as of the date of publication of the title pages, 1849. I indicate the year of publication of the plates in parentheses. The authors' names attached to species in Blanchard's explanations of plates are commonly wrong; as elsewhere, I have ignored such errors and cited the correct authors.

Another source of confusion has been two articles published in 1807 in Illiger's Magazin für Insektenkunde.

The first (Illiger, 1807) shows no author either in the table of contents of the volume or in the text itself, an indication that it was written by Illiger. The second (Klug, 1807b) is attributed to Klug in both places. The two articles were published simultaneously; page 199 of the first article is on the same leaf as page 200 of the second. Some of the same generic names were proposed in both articles. All of them have been attributed in the past to Klug, and Illiger's article in most cases credits Klug with such names. Given that publication was simultaneous, I have adjusted the references to retain Klug's authorship, in different ways in different cases because of differing treatments in the two articles concerned.

Westwood (1840a) listed a typical British species for each genus. These have been taken as type designations, in accordance with Opinion 71 of the Commission (1922). Westwood listed synonymous generic names in his accounts of many genera, often with the notation "p." for "part." It seems clear that he was merely listing synonyms and that his type designations did not apply to these synonymous names.

Méhelÿ's monumental work (1935) on palearctic Hylaeus included descriptions of various subgenera. When monobasic, such subgenera are valid, but those including more than one species are invalid because of his failure to designate a type species, a requirement after 1930 (Code, 3rd ed., Art. 13b). Popov (1939) rectified the situation by designating type species as needed, except for certain of Méhelÿ's subgenera which he (and subsequent authors) regarded as junior synonyms. Popov's format included a heading for a subgenus, followed by a list of synonyms, descriptive material, and then a statement of the type species. It is clear that his intention was to designate a type species for the subgenus indicated in the heading. Sandhouse (1943), however, considered that same species to be the type of each of the synonymized names, resulting in the same type species for more than one of Méhelÿ's subgenera. Popov's paper cannot be read to justify this; he did not designate type species for Méhelÿ's names that he considered synonyms. Sandhouse herself could be interpreted to have designated type species for the junior synonyms, although such types would not be species included under those names by Méhelÿ. Thus, for example, Imperfecta Sandhouse, 1943, would have as type species Hylaeus brevicornis Nylander (a species of Dentigera); it would not be the same as Imperfecta Méhelÿ, and therefore, not being accompanied by a description or relevant bibliographic reference, would be a nomen nudum. Moreover, Sandhouse's type designations do not validate these subgeneric names, since she considered these names to be junior synonyms and they were not adopted as the names of taxa before 1961 (Code, 3rd ed., Art. 11c). They thus remain invalid. The names involved are Auricularia, Imperfecta, Pectinata, Pseudobranchiata, and Trichota. All this has no effect whatever on the current nomenclature and I have included these names below only as proposed by Méhelÿ, not as attributed to Popov or Sandhouse.

- Abda Sandhouse, 1943:521, replacement for Anthedon Robertson, 1900. Type species: Melissodes compta Cresson, 1878, autobasic. See Anthedonia. Eucerini.
- Abromelissa Snelling and Brooks, 1985:23. Type species: Melissa lendliana Friese, 1910, by original designation. Ericrocidini.
- Abrupta Méhelÿ, 1935:32, 137. Type species: Hylaeus cornutus Curtis, 1831, monobasic. Sandhouse (1943) attributed Abrupta to Popov (1939), perhaps because Méhelÿ, while including only one species, listed another specific name as a synonym. She may thus have considered that Méhelÿ included two species without designating a type. [Prosopis]. Hylaeinae.
- Acalcaripes Pesenko. 1984:347. Type species: Halictus patellatus Morawitz, 1873, by original designation. [Halictus]. Halictini.
- Acamptopoeum Cockerell, 1905a:320. Type species: Camptopoeum trifasciatum Spinola, 1851, sensu Cockerell, 1905a = Camptopoeum submetallicum Spinola, 1851, monobasic. Because of Cockerell's misidentification, the type species was designated as Camptopoeum submetallicum Spinola, 1851, by Commission Opinion 1759 (1994). Panurginae.
- Acanthalictus Cockerell, 1924a:184. Type species: Halictus dybowskii Radoszkowski, 1877, by original designation. Halictini.
- Acanthidium Michener and Griswold, 1994a:305. Type species: Acanthidium batrae Michener and Griswold, 1994 = Dianthidium flavoclypeatum Gupta, 1993, by original designation. Anthidiini.
- Acanthomelecta Lieftinck, 1972:316. Type species: Crocisa bicuspis Stadelmann, 1898, by original designation. Melectini.
- Acanthonomada Schwarz, 1966:383. Type species: Nomada odontophora Kohl, 1905, by original designation. Nomadini.
- Acanthopus Klug, 1807, in Illiger, 1807:199; Klug, 1807b:226. Type species: Apis splendida Fabricius, 1793 = Apis palmata Olivier, 1789, monobasic. Acanthopus is consistently attributed to Klug in the literature. It was published in two consecutive articles in the same journal and thus simultaneously; the first was by Illiger, who, however, attributed the name to Klug; the second was by Klug. Dalla Torre (1896) listed both references under the species but attributed the generic name to Klug, and may therefore be regarded as the first reviser, and to have decided the question as to authorship of Acanthopus. Ericrocidini.
- Acanthosmia Thomson, 1872:233; no species. Species first included by Schmiedeknecht, 1885:21. Type species: Osmia montivaga Morawitz, 1872, by designation of Sandhouse, 1943:522. [Osmia]. Osmiini.
- Acanthosmiades Titus, 1904b:101, incorrect subsequent spelling of Acanthosmioides Ashmead, 1899. Osmiini.
- Acanthosmioides Ashmead, 1899a:76. Type species: Osmia odontogaster Cockerell, 1897, by original designation. Osmiini.

- Acentron Mitchell, 1934:307. Type species: Megachile albitarsis Cresson, 1872, by original designation. [Megachile]. Megachilini.
- Aceratosmia Schmiedeknecht, 1885:19. Type species: Osmia emarginata Lepeletier, 1841, by designation of Sandhouse, 1939:9. [Osmia]. Osmiini.
- Aciandrena Warncke, 1968:62. Type species: Andrena aciculata Morawitz, 1886, by original designation. [Andrena]. Andreninae.
- Ackmonopsis Brooks, 1988:508. Type species: Anthophora mimadvena Cockerell, 1916, by original designation. [Amegilla]. Anthophorini.
- Acritocentris Snelling, 1974:36. Type species: Centris ruthannae Snelling, 1966, by original designation. [Centris]. Centridini.
- Acrocoelioxys Mitchell, 1973: 71. Type species: Coelioxys otomita Cresson, 1878, by original designation. [Coelioxys]. Megachilini.
- Acrosmia Michener, 1947:298. Type species: Hoplitis plagiostoma Michener, 1947, by original designation. [Hoplitis]. Osmiini.
- Acroxylocopa Hurd and Moure, 1963:236. Type species: Xylocopa capitata Smith, 1854, by original designation. [Xylocopa]. Xylocopini.
- Acunomia Cockerell, 1930, in Cockerell and Blair, 1930:11. Type species: *Nomia nortoni* Cresson, 1868, by original designation. [Nomia]. **Nomiinae.**
- Adanthidium Moure, 1965:29. Type species: Anthidium texanum Cresson, 1878, by original designation. Anthidiini.
- Addendella Mitchell, 1980:24. Type species: Megachile addenda Cresson, 1878, by original designation. [Megachile]. Megachilini.
- Adventoribombus Skorikov, 1922a:25. Type species: Apis sylvarum Linnaeus, 1761, by designation of Yarrow, 1971:28. Agrabombus [sic] adventor Skorikov, 1914 = B. filchnerae Vogt, 1908, designated by Sandhouse, 1943:522, was not originally included. [Agrobombus]. Isotypic with Thoracobombus. Bombini.
- Aeganopria Moure, 1949a:442. Type species: Lonchopria nivosa Vachal, 1909, by original designation. Colletinae.
- Aenandrena Warncke, 1968:64. Type species: Andrena aeneiventris Morawitz, 1872, by original designation. [Andrena]. Andreninae.
- Aethammobates Baker, 1994:155. Type species: Aethammobates prionogaster Baker, 1994, by original designation. Ammobatoidini.
- Aethechlora Moure and Hurd, 1987:275. Type species: Augochlora matucanensis Cockerell, 1914, by original designation. [Augochlora]. Augochlorini.
- Aframegilla Popov, 1950b:260. Type species: Anthophora nubica Lepeletier, 1841, by original designation. [Amegilla]. Anthophorini.
- Afranthidium Michener, 1948a:24. Type species: Hypanthidium halophihum Cockerell, 1936 = Anthidium reicherti Brauns, 1929, by original designation. [Anthidium]. Anthidiini.

- Afrodialictus Pauly, 1984b:142. Type species: Halictus bellulus Vachal, 1909, by original designation. [Lasioglossum]. Halictini.
- Afrodufourea Ebmer, 1984:362. Type species: Dufourea punica Ebmer, 1976, by original designation. [Dufourea]. **Rophitinae.**
- Afroheriades Peters, 1970:157. Type species: Pseudoheriades primus Peters, 1970, by original designation. [Pseudoheriades]. Osmiini.
- Afromelecta Lieftinck, 1972:309. Type species: Crocisa fulvohirta Cameron, 1905, by original designation. Melectini.
- Afronomia Pauly, 1990:126. Type species: Nomia picardi Gribodo, 1894, by original designation. Nomiinae.
- Afrostelis Cockerell, 1931b:340. Type species: Afrostelis tegularis Cockerell, by original designation. Anthidiini.
- Afroxylocopa Hurd and Moure, 1963:264. Type species: Apis nigrita Fabricius, 1775, by original designation. [Xylocopa]. **Xylocopini.**
- Agaesischia Moure and Michener, 1955b:273. Type species: Eucera patellicornis Ducke, 1910, by original designation. [Gaesischia]. Eucerini.
- Agandrena Warncke, 1968:56. Type species: Apis agilissima Scopoli, 1770, by original designation. [Andrena]. Andreninae.
- Agapanthinus LaBerge, 1957:35. Type species: Melissodes callophila Cockerell, 1923, by original designation. Eucerini.
- Agapostemon Guérin-Méneville, 1844:448. Type species: Apis femoralis Guérin-Méneville, 1844 = Apis viridula Fabricius, 1793, monobasic. [Andrena]. Halictini.
- Agapostemonoides Roberts and Brooks, 1987:364. Type species: Agapostemonoides hurdi Roberts and Brooks, 1987, by original designation. **Halictini.**
- Agatheucera Sitdikov and Pesenko, 1988:87. Type species: Eucera bidentata Pérez, 1887, by original designation. [Eucera]. Eucerini.
- Agemmonia Michener, 1981:26. Type species: Nomia tsavoensis Strand, 1920, by original designation. Meganomiinae.
- Aglaa Schulz, 1906:258. Unjustified emendation of Aglae Lepeletier and Serville, 1825. Euglossini.
- Aglae Lepeletier and Serville, 1825:105. Type species: Aglae caerulea Lepeletier and Serville, 1825, monobasic. Euglossini.
- Aglaoapis Cameron, 1901b:262. Type species: Aglaoapis brevipennis Cameron, 1901, monobasic. Dioxyini.
- Aglaomelissa Snelling and Brooks, 1985:25. Type species: Melissa duckei Friese, 1906, by original designation. Ericrocidini.
- Agogenohylaeus Michener, 1965a:148. Type species: *Prosopis nubilosellus* Cockerell, 1910, by original designation. [Amphylaeus]. **Hylaeinae.**
- Agribombus Skorikov, 1938a:145, unjustified emendation of Agrobombus Vogt, 1911. **Bombini.**

- Agrobombus Vogt, 1911:52. Type species: *Apis agrorum* Fabricius, 1787 (not Schrank, 1781) = *Apis pascuorum* (Scopoli), 1763, by designation of Sandhouse, 1943:523. [Bombus]. **Bombini.**
- Alayoapis Michener, 1966a:728. Type species: Megacilissa nigrescens Cresson, 1869, by original designation. [Caupolicana]. Caupolicanini.
- Albocolletes Warncke, 1978:353. Type species: Halictus albomaculatus Lucas, 1849, by original designation. [Colletes]. Colletinae.
- Alcidamea Cresson, 1864:385. Type species: Alcidamea producta Cresson, 1864, by designation of Michener, 1941:158. Isotypic with Autochelostoma by synonymy. Osmini.
- Alepidosceles Moure, 1947b:244. Type species: Ancyloscelis imitatrix Schrottky, 1909, by original designation. Emphorini.
- Alfkenella Börner. 1919:168. Type species: Apis quadrifasciata Villers, 1789, by original designation. Isotypic with Amegilla. Anthophorini.
- Alfkenomia Hirashima, 1956:33, replacement for *Epinomia* Alfken, 1939. Type species: *Nomia andrenoides* Vachal, 1903 = *Nomia andrei* Vachal, 1897, autobasic. **Nomiinae.**
- Alfkenylaeus Snelling, 1985:13. Type species: Hylaeus namaquensis Cockerell, 1942, by original designation. [Hylaeus]. Hylaeinae.
- Allanthidium Moure, 1947a:21. Type species: Anthidium rodolfi Ruiz, 1938, by original designation. Anthidiini.
- Allochalicodoma Tkalců, 1969:359. Type species: Chalicodoma lefebvrei Lepeletier, 1841, by original designation. [Chalicodoma]. Isotypic with Heteromegachile. Megachilini.
- Allocoelioxys Tkalců, 1974a:340. Type species: Coelioxys afra Lepeletier, 1841, by original designation. Isotypic with Coelioxita. Megachilini.
- Allodapa Schulz, 1906:244, unjustified emendation of *Allodape* Lepeletier and Serville, 1825. **Allodapini.**
- Allodape Lepeletier and Serville, 1825:18. Type species: Allodape rufogastra Lepeletier and Serville, 1825, monobasic. Allodapini.
- Allodapula Cockerell, 1934c:220. Type species: Allodape variegata Smith, 1854, by original designation. [Allodape]. Allodapini.
- Allodapulodes Michener, 1969:291. Type species: Allodape palliceps Friese, 1924, by original designation. [Allodapula]. Allodapini.
- Allodioxys Popov, 1947:87. Type species: *Dioxys schulthessi* Popov, 1936, by original designation. **Dioxyini.**
- Allomacrotera Timberlake, 1960:131. Type species: *Perdita stephanomeriae* Timberlake, 1954, by original designation. [Perdita]. **Panurginae.**
- Allomegachile Rebmann, 1970:42. Type species: Megachile asiatica Morawitz, 1875, by original designation. [Megachile]. Isotypic with Euchalicodoma. Megachilini.

- Alloperdita Viereck, 1917:241. Type species: Perdita novaeangliae Viereck, 1907, monobasic. [Perdita]. Panurginae.
- Allopsithyrus Popov, 1931a:136. Type species: Apis barbutella Kirby, 1802, by original designation. [Psithyrus]. Bombini.
- Alloscirtetica Holmberg, 1909a:77, replacement for Sciretetica Holmberg, 1903. Type species: Scirtetica antarctica Holmberg, 1903, autobasic. Isotypic with Holmbergiapis and Neoscirtetica. Eucerini.
- Allosmia Tkalců, 1974a:331. Type species: Osmia rufohirta Latreille, 1811, by original designation. [Osmia]. Osmiini.
- Alloxylocopa Maa, 1939:155. Type species: *Xylocopa appendiculata* Smith, 1852, by original designation. Nomen nudum because no characters given; see the Code, 3rd ed., Art. 13(a)(i). [Xylocopa]. **Xylocopini.**
- Alloxylocopa Hurd and Moure, 1963:239. Type species: *Xylocopa appendiculata* Smith, 1852, by original designation. [Xylocopa]. **Xylocopini.**
- Alocandrena Michener, 1986c:68. Type species: Alocandrena porteri Michener, 1986, by original designation. Andreninae.
- Alphaneura Gray, 1832:pl. 111, alternative for Aphaneura Gray. Type species: Aphaneura rufescens Gray, autobasic. Meliponini.
- Alpigenibombus Skorikov, 1938a:145, unjustified emendation of Alpigenobombus Skorikov, 1914. **Bombini.**
- Alpigenobombus Skorikov, 1914a:128. Type species: Alpigenobombus pulcherrimus Skorikov, 1914 = Bombus kashmirensis Friese, 1909, by designation of Williams, 1991:65. Bombus alpigenus Morawitz, designated as the type species by Frison, 1927:54, was not an originally included species; see Williams, 1991. [Bombus]. Bombini.
- Alpinibombus Skorikov, 1937:53, unjustified emendation of Alpinobombus Skorikov, 1914. **Bombini.**
- Alpinobombus Skorikov, 1914a:122. Type species: Apis alpinus Linnaeus, 1758, by designation of Frison, 1927:66. [Bombus]. **Bombini.**
- Alpinodufourea Ebmer, 1984:360. Type species: Dufourea alpina Morawitz, 1865, by original designation. [Dufourea]. **Rophitinae.**
- Amalthea Rafinesque, 1815:123, unjustified replacement for *Trigona* Jurine. Type species: *Apis amalthea* Olivier, 1789, autobasic and by absolute tautonomy. **Meliponini.**
- Amblyapis Cockerell, 1910b:362. Type species: Halictoides ilicifoliae Cockerell, 1910, by original designation. [Halictoides]. Dasypodinae.
- Amblys Klug, 1807, in Illiger, 1807:198; Klug, 1807b:226. Type species: Apis bicornis Linnaeus, 1758 = Apis rufa Linnaeus, 1758, by designation of Latreille, 1811:577. Monobasic in Illiger, 1807; Klug, 1807b was published simultaneously and listed two species. Isotypic with Osmia and Ceratosmia; isotypic with Pachyosmia by synonymy. Osmiini.
- Amblyspatulariella Pittioni, 1950:80. Type species: *Prosopis sulphuripes* Gribodo, 1894, by original designation. [Prosopis]. **Hylaeinae.**

- Amegachile Friese, 1909a:326. Type species: Megachile sjoestedti Friese, 1901 = Megachile bituberculata Ritsema, 1880, by designation of Cockerell, 1931c:167. Mitchell's (1934:298) designation of Megachile nasicornis Friese, 1903, as the type species is subsequent and therefore invalid. [Megachile]. Megachilini.
- Amegilla Friese, 1897a:18, 24. Type species: Apis quadrifasciata Villers, 1789, by designation of Cockerell, 1931e:277. [Podalirius]. Isotypic with Alfkenella. Anthophorini.
- Ammobates Latreille, 1809:169. Type species: Ammobates rufiventris Latreille, 1809, by designation of Latreille, 1810:439. Ammobates bicolor Lepeletier and Serville, 1825, designated by Blanchard, 1849:pl. 127 (1846), was not originally included. Ammobatini.
- Ammobatoides Radoszkowski, 1868:82, not Schenck, 1869. Type species: *Phileremus abdominalis* Eversmann, 1852, by designation of Sandhouse, 1943:525. Isotypic with *Phiarus* and *Paidia*. **Ammobatoidini**.
- Ammobatoides Schenck, 1869:349, not Radoszkowski, 1868. Type species: Ammobates bicolor Lepeletier and Serville, 1825 = Epeolus punctatus Fabricius, 1804, monobasic. Not replaced because synonym of Ammobates. Isotypic with Phileremus by synonymy. Ammobatini.
- Amphipedia Michener and Moure, 1957:413. Type species: Tetrapedia haeckeli Friese, 1910, by original designation. [Paratetrapedia]. **Tapinotaspidini.**
- Amphylaeus Michener, 1965a:147, 149. Type species: *Prosopis morosa* Smith, 1879, by original designation. **Hylaeinae**.
- Anacolletes Michener, 1965a:59. Type species: Lamprocolletes bimaculatus Smith, 1879, by original designation. [Leioproctus]. Colletinae.
- Analastoroides Rayment, 1950:20. Type species: Analasteroides foveata Rayment, 1950, by original designation. Hylaeinae.
- Ananthidiellum Pasteels, 1969a:49. Type species: Anthidium anale Friese, 1914, by original designation. [Anthidiellum]. Anthidiini.
- Ananthidium Urban, 1991:73. Type species: Anthidium inerme Friese, 1908, by original designation. Anthidiini.
- Anchandrena LaBerge, 1986:496. Type species: Andrena angustella Cockerell, 1936, by original designation. [Andrena]. Andreninae.
- Anchirhiza Michener, 1965a:147. Type species: Palaeorhiza mandibularis Michener, 1965, by original designation. [Palaeorhiza]. Hylaeinae.
- Ancyla Lepeletier, 1841:294. Type species: Ancyla oraniensis Lepeletier, 1841, monobasic. Isotypic with *Plistotrichia* by synonymy. Ancylini.
- Ancylandrena Cockerell, 1930d:5. Type species: Andrena heterodoxa Cockerell, 1930, not Pérez, 1903 = A. atoposoma Cockerell, 1934, monobasic. [Andrena]. Andreninae.
- Ancylocopa Maa, 1954:198. Type species: *Xylocopa nitidiventris* Smith, 1878, by original designation. [Proxylocopa]. **Xylocopini.**

- Ancylosceles Haliday, 1836:320, unjustified emendation of Ancyloscelis Latreille, 1829. Emphorini.
- Ancyloscelis Berthold, 1827:466, nomen nudum. Latinization of Ancyloscele Latreille, 1825:463. Emphorini.
- Ancyloscelis Latreille, 1829:355, no included species; Haliday, 1836:320, one included species. Type species: Ancylosceles (sic) ursinus Haliday, 1836, first included species. Blanchard, 1849:pl. 128 (1847), designated Ancyloscelis brasiliensis Blanchard, 1847, as type species but it was not the first included species. Emphorini.
- Ancyloscelus Berthold, 1827:565, nomen nudum. Emphorini.
- Ancylosoma Dalla Torre, 1896:206. This name appeared in the synonymy of Xylocopa brasilianorum (Linnaeus), as "Apis (Ancylosoma) Brasilianorum Blanchard, ...1849...." The Blanchard reference is to pl. 128 (1847), where Ancylosoma does not appear. Blanchard, however, did propose Ancyloscelis brasiliensis for a probable tapinotaspine bee on the plate and figure numbers listed by Dalla Torre. Evidently Dalla Torre erred in genus and species names, and in placing the reference among genuine Xylocopa references. The species name Apis (Ancylosoma) brasilianorum Blanchard refers to no species; Ancylosoma Dalla Torre appeared only in synonymy under Xylocopa, associated with a nonexistent species, and therefore also is not available for use. [Apis]. Not available.
- Andinaugochlora Eickwort, 1969:407. Type species: Andinaugochlora micheneri Eickwort, 1969, by original designation. Augochlorini.
- Andineta Ashmead, 1899a:71, incorrect subsequent spelling for Audinetia Lepeletier, 1841. **Xylocopini.**
- Andrena Fabricius, 1775:376. Type species: Apis helvola Linnaeus, 1758, by designation of Viereck, 1912:613. Apis cineraria Linnaeus, 1758, designated by Latreille, 1810:439; Apis nitida Fourcroy, 1785, designated by Curtis, 1826:pl. 129; and Andrena funebris Panzer, 1798 = Apis albopunctata Rossi, 1792, designated by Blanchard, 1849:pl. 125 (1847) were not originally included species. Andreninae.
- Andrenella Hedicke, 1933:210. Type species: Melitta minutula Kirby, 1802, by original designation. [Andrena]. Andreninae.
- Andrenopsis Cockerell, 1905a:363. Type species: Andrenopsis flavorufus Cockerell, 1905, monobasic. Colletinae.
- Androgynella Cockerell, 1911c:313. Type species: Megachile detersa Cockerell, 1910, by original designation. Megachilini.
- Andronicus Cresson, 1864:384. Type species: Andronicus cylindricus Cresson, 1864 (not Osmia cylindrica Giraud, 1857) = Osmia spoliata Provancher, 1888, monobasic. Osmiini.
- Anepicharis Moure, 1945b:302. Type species: Epicharis dejeanii Lepeletier, 1841, by original designation. Centridini.
- Angochlora Schrottky, 1901:213, incorrect subsequent spelling (repeated) for Augochlora Smith, 1853. Augochlorini.
- Angochloropsis Schrottky, 1901:213, incorrect subsequent spelling for Augochloropsis Cockerell, 1897. [Angochlora]. Augochlorini.

- Anhylaeus Heider, 1926:184, unjustified emendation of Anylaeus Bridwell, 1919. **Hylaeinae.**
- Annosmia Warncke, 1991b:307. Type species: Osmia annulata Latreille, 1811, by original designation. [Osmia]. Osmiini.
- Anodonteutricharaea Tkalců, 1993b:807. Type species: Megachile larochei Tkalců, 1993 = Megachile lanigera Alfken, 1933, by original designation. [Megachile]. Megachilini.
- Anodontobombus Krüger, 1917:61. Type species: Apis hypnorum Linnaeus, 1758, by designation of Williams, 1991:69. A sectional name treated as a genus-group name in view of the Code, 3rd ed., Art. 10(e). [Bombus]. Isotypic with Pyrobombus, Uncobombus, and Hypnorobombus. Bombini.
- Anoediscelis Toro and Moldenke, 1979:131. Type species: Oediscelis herbsti Friese, 1906, by original designation. Xeromelissinae.
- Anomalohesma Exley, 1977:39. Type species: *Brachyhesma scapata* Exley, 1977, by original designation. [Brachyhesma]. Euryglossinae.
- Anthedon Robertson, 1900:53, not Agassiz, 1846. Type species: Melissodes compta Cresson, 1878, monobasic. See Abda and Anthedonia. Eucerini.
- Anthedonia Michener, 1942:282, replacement for Anthedon Robertson, 1900. Type species: Melissodes compta Cresson, 1878, autobasic. Eucerini.
- Anthemoessa Robertson, 1905:372, not Agassiz, 1846. Type species: Anthophora abrupta Say, 1837, by original designation. See Melea. Anthophorini.
- Anthemois Robertson, 1903a:168, 172. Type species: Megachile infragilis Cresson, 1878 = Apis centuncularis Linnaeus, 1758, by original designation. Isotypic with Megachile by synonymy. Megachilini.
- Anthemurgus Robertson, 1902b:321. Type species: Anthemurgus passiflorae Robertson, 1902, monobasic. Panurginae.
- Anthidianum Michener, 1948a:13, replacement for Trichanthidium Moure, 1947. Type species: Anthidium subpetiolatum Schrottky, 1910, autobasic. [Allanthidium]. Anthidiini.
- Anthidiellum Cockerell, 1904c:3. Type species: *Trachusa strigata* Panzer, 1805, by original designation. [Anthidium]. Isotypic with *Cerianthidium*. **Anthidiini**.
- Anthidioma Pasteels, 1984:34. Type species: Anthidioma chalicodomoides Pasteels, 1984, by original designation. Anthidiini.
- Anthidium Fabricius, 1804:364. Type species: Apis manicata Linnaeus, 1758, by designation of Latreille, 1810:439. Anthidiini.
- Anthidulum Michener, 1948a:19. Type species: Dianthidium currani Schwarz, 1933, by original designation. [Dianthidium]. Anthidiini.
- Anthocharessa Gistel, 1850:82, unjustified replacement for Andrena Fabricius, 1775. Type species: Apis helvola Linnaeus, 1758, autobasic. Andreninae.

- Anthocopa Lepeletier and Serville, 1825:314. Type species: Apis papaveris Latreille, 1799, monobasic. Isotypic with Phyllotoma and Furcosmia. Osmiini.
- Anthodioctes Holmberg, 1887b:36. Nomen nudum. Anthidiini.
- Anthodioctes Holmberg, 1903:435. Type species: Anthodioctes megachiloides Holmberg, 1903, by designation of Cockerell, 1927b:2. A. dasygastrinus Holmberg, 1903, designated as type species by Isensee, 1927:375, was not an originally included species name and is not a published name so far as known. Anthidiini.
- Anthoglossa Smith, 1853:16. Type species: Anthoglossa plumata Smith, 1853, monobasic. Colletinae.
- Anthomegilla Marikovskaya, 1976:688. Type species: Anthophora arctica Morawitz, 1883, by original designation. Anthophorini.
- Anthophora Latreille, 1803:167, replacement for Podalirius Latreille, 1802. Type species: Apis pilipes Fabricius, 1775 = Apis plumipes Pallas, 1772, designated by Commission Opinion 151 (1944). Apis retusa Linnaeus, 1758, designated as type species by Curtis, 1831:pl. 357, is not an originally included species. Anthophorini.
- Anthophorisca Michener and Moure, 1957:433. Type species: Melissodes pygmaea Cresson, 1872, by original designation. [Exomalopsis]. Exomalopsini.
- Anthophorites Heer, 1850:97. Type species: Anthophorites mellona Heer, 1850, designated by Cockerell, 1909d:315. Fossil.
- Anthophoroides Cockerell and Cockerell, 1901:48. Type species: *Podalirius vallorum* Cockerell, 1896, by original designation. **Anthophorini.**
- Anthophorula Cockerell, 1897d:44. Type species: Anthophorula compactula Cockerell, 1897, monobasic. Exomalopsini.
- Anthrena Illiger, 1801:127, unjustified emendation of Andrena Fabricius, 1775. Andreninae.
- Anthrenoides Ducke, 1907:368. Type species: Anthrenoides alfkeni Ducke, 1907 = Protandrena meridionalis Schrottky, 1906, monobasic. Panurginae.
- Anylaeus Bridwell, 1919:129. Type species: Nothylaeus aberrans Bridwell, 1919, by original designation. [Nothylaeus]. **Hylaeinae.**
- Aparatrigona Moure, 1951a:60. Type species: Melipona impunctata Ducke, 1916, by original designation. [Paratrigona]. Meliponini.
- Apathus Newman, 1834:404 footnote, unjustified replacement for *Psithyrus* Lepeletier, 1832. Type species: *Apis rupestris* Fabricius, 1793, autobasic. **Bombini.**
- Apeulaema Moure, 1950b:184. Type species: Eulaema fasciata Lepeletier, 1841 = Centris cingulata Fabricius, 1804, by original designation. [Eulaema]. Euglossini.
- Aphalictus Cockerell, 1930e:40. Type species: Parasphecodes bribiensis Cockerell, 1916, by original designation. [Parasphecodes]. Halictini.

- Aphaneura Gray, 1832:575. Type species: Aphaneura rufescens Gray, 1832, monotypic. See Alphaneura Gray, and Michener, 1995. Meliponini.
- Aphelonomada Snelling, 1986:9. Type species: Nomada cruralis Moure, 1960, by original designation. [Hypochrotaenia]. Nomadini.
- Apianthidium Pasteels, 1969a:41. Type species: Anthidium apiforme Meade-Waldo. 1914, by original designation. Anthidiini.
- Apiaria Germar, 1839:210. Type species: Apiaria dubia Germar, 1839, monobasic. Fossil.
- Apiarus Rafinesque, 1815:123, unjustified replacement for Apis Linnaeus, 1758. Type species: Apis mellifera Linnaeus, 1758, autobasic. Apini.
- Apicula Rafinesque, 1814:27, unjustified replacement for Apis Linnaeus, 1758. Type species: Apis mellifera Linnaeus, 1758, autobasic. Apini.
- Apis Linnaeus, 1758:343, 574. Type species: Apis mellifica Linnaeus, 1761 = A. mellifera Linnaeus, 1758, by designation of Latreille, 1810:439. Apini.
- Apista Smith, 1861:148, not Hübner, 1816. Type species: Apista opalina Smith, 1861, monobasic. See Egapista. Dissoglottini.
- Apomelissodes LaBerge, 1956:1175. Type species: Melissodes fimbriata Cresson, 1878, by original designation. [Melissodes]. Eucerini.
- Aporandrena Lanham, 1949:201. Type species: Andrena coactipostica Viereck, 1917, by original designation. [Andrena]. Andreninae.
- Apotrigona Moure, 1961:233. Type species: *Trigona nebulata* Smith, 1854, by original designation. **Meliponini.**
- Apoxylocopa Hurd and Moure, 1963:226. Type species: Xylocopa lugubris Gerstaecker, 1857, by original designation. [Xylocopa]. Xylocopini.
- Archeriades Peters, 1978a:337. Type species: Eriades larvatus Friese, 1909, by original designation. Osmiini.
- Archiandrena LaBerge, 1986:482. Type species: Andrena banksi Malloch, 1917, by original designation. [Andrena]. Andreninae.
- Archianthidium Mavromoustakis, 1939:91. Type species: Anthidium laticeps Morawitz, 1873, by original designation.

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- Archihalictus Pauly. 1984b:132. Type species: Halictus joffrei Benoist, 1962, by original designation. Halictini.
- Archimegachile Alfken, 1933:56. Type species: Megachile flavipes Spinola, 1838, by original designation. [Megachile]. Megachilini.
- Arctosmia Schmiedeknecht, 1885:21. Type species: Megachile villosa Schenck, 1853 (not Apis villosa Fabricius, 1775) = Osmia platycera Gerstaecker, 1869, monobasic. [Osmia]. Isotypic with Lithosmia. Osmiini.
- Ardenthidium Pasteels, 1969a:103. Type species: Anthidium ardens Smith, 1879, by original designation. [Anthidium]. Anthidiini.

- Argalictus Pesenko, 1984:348. Type species: Hylaeus senilis Eversmann, 1852, by original designation. [Halictus]. Halictini.
- Argohesma Exley, 1969:528. Type species: Argohesma eremica Exley, 1969, by original designation. Euryglossinae.
- Argyropile Mitchell, 1934:308. Type species: Megachile parallela Smith, 1853, by original designation. [Megachile]. Megachilini.
- Argyroselenis Robertson, 1903c:284. Type species: *Triepeolus minimus* Robertson, 1902, by original designation. **Epeolini.**
- Arhysoceble Moure, 1948:335. Type species: Arhysoceble xanthopoda Moure, 1948, by original designation. Tapinotaspidini.
- Arhysosage Brèthes, 1922:121. Type species: Arhysosage johnsoni Brèthes, 1922 = Camptopoeum ochraceum Friese, 1908, monobasic. Isotypic with Ruiziella and Ruziapis by synonymy. Panurginae.
- Ariphanarthra Moure, 1951b:137. Type species: Ariphanarthra palpalis Moure, 1951, by original designation. Augochlorini.
- Arogochila Michener, 1939:58. Type species: Ashmeadiella timberlakei Michener, 1936, by original designation. [Ashmeadiella]. Osmiini.
- Asaropoda Cockerell, 1926b:216. Type species: Saropoda bombiformis Smith, 1854, by original designation. Anthophorini.
- Ascirtetica Moure and Michener, 1955b:260. Type species: Eucera herbsti Friese, 1906, by original designation. [Alloscirtetica]. Eucerini.
- Ashmeadiella Cockerell, 1897c:197. Type species: Heriades opuntiae Cockerell, 1897, by original designation. Osmiini.
- Ashtonipsithyrus Frison, 1927:69. Type species: Apathus ashtoni Cresson, 1864, by original designation. [Psithyrus]. Bombini.
- Asianthidium Popov, 1950a:315. Type species: Anthidium glasunovi Morawitz, 1894, by original designation. [Meganthidium]. Anthidiini.
- Aspidosmia Brauns, 1926:208. Type species: Osmia arnoldi Brauns, 1926, monobasic. [Osmia]. Osmiini.
- Asteronomada Broemeling, 1988:336. Type species: Nomada adducta Cresson, 1878, by original designation. [Nomada]. Nomadini.
- Atopeucera Tkalců, 1984b:71. Type species: Eucera seminuda Brullé, 1832, by original designation. [Eucera]. **Eucerini.**
- Atoposmia Cockerell, 1935a:50. Type species: Osmia triodonta Cockerell, 1935, monobasic. [Osmia]. Osmiini.
- Atrocinctob[ombus] Skorikov, 1933b:244, nomen nudum. Bombini.
- Atrodufourea Ebmer, 1984:360. Type species: Rophites atrata Warncke, 1979, by original designation. [Dufourea]. Rophitinae.
- Atronomioides Pesenko, 1983:186. Type species: Ceylalictus warnckei Pesenko, 1983, by original designation. [Ceylalictus]. Nomioidinae.

- Atropium Pasteels, 1984:132. Type species: Megachile atropos Smith, 1853, by original designation. Anthidiini.
- Atrosamba Michener, 1981:65. Type species: Haplomelitta atra Michener, 1981, by original designation. [Haplomelitta]. Dasypodinac.
- Audineta Ashmead, 1899a:97, incorrect subsequent spelling for Audinetia Lepeletier, 1841. **Xylocopini.**
- Audinetia Lepeletier, 1841;203. Type species: Apis latipes Drury, 1773, by designation of Sandhouse, 1943;529. [Xylocopa]. Isotypic with *Platynopoda*. **Xylocopini**.
- Augandrena LuBerge, 1986:557. Type species: Andrena plumiscopa Timberlake, 1951, by original designation. [Andrena]. Andreninae.
- Augochlora Smith, 1853:73. Type species: Halictus purus Say, 1837, designated by Cockerell, 1923b:448. Augochlorini.
- Augochlorella Sandhouse, 1937:66. Type species: Augochlora gratiosa Smith, 1853, by original designation. Augochlorini.
- Augochlorodes Moure, 1958:53. Type species: Augochlorodes turrifaciens Moure, 1958, by original designation. Augochlorini.
- Augochloropsis Cockerell, 1897b:4. Type species: Augochlora subignita Cockerell, 1897 = Augochlora ignita Smith, 1861, by original designation. Augochlora spinolae Cockerell, 1900, designated by Schrottky, 1909b:481, was not originally included. [Augochlora]. Augochlorini.
- Auricularia Méhelÿ, 1935:41, 147. Invalid because no type species was designated. Sandhouse's (1943:529) view that Popov (1939) designated a type species and thus validated the name is incorrect. [Prosopis]. Hylaeinae.
- Ausanthidium Pasteels, 1969a:60. Type species: Anthidiellum ausense Mavromoustakis, 1934, by original designation. Anthidiini.
- Australictus Michener, 1965a:165. Type species: Halictus peraustralis Cockerell, 1904, by original designation. [Lasioglossum]. Halictini.
- Austrandrena Cockerell, 1906c:37. Type species: Andrena modesta Smith, 1879, by original designation. [Protandrena]. Panurginae.
- Austrevylaeus Michener, 1965a:170. Type species: Halictus sordidus Smith, 1853, by original designation. [Lasioglossum]. Halictini.
- Austrochile Michener, 1965a:202. Type species: Megachile resinifera Meade-Waldo, 1915, by original designation. [Chalicodoma]. Megachilini.
- Austrodioxys Cockerell, 1916a:432. Type species: Austrodioxys thomasi Cockerell, 1916 = Caenoprosopis crabronina Holmberg, 1887, monobasic. Isotypic with Caenoprosopis by synonymy. Caenoprosopidini.
- Austromegachile Mitchell, 1943:666. Type species: Megachile montezuma Cresson, 1878, by original designation. [Megachile]. Megachilini.
- Austronomia Michener, 1965a:156. Type species: Nomia australica Smith, 1875, by original designation. [Nomia]. Nomiinae.

- Austropanurgus Toro, 1980:209. Type species: Austropanurgus punctatus Toro, 1980, monobasic. Panurginae.
- Austropeponapis Hurd and Linsley, 1970:21. Type species: Tetralonia melonis Friese, 1925, by original designation. [Peponapis]. Eucerini.
- Austroplebeia Moure, 1961:195. Type species: Trigona cassiae Cockerell, 1910, by original designation. Meliponini.
- Austrosphecodes Michener, 1978b:327. Type species: Sphecodes chilensis Spinola, 1851, by original designation. [Sphecodes]. Halictini.
- Austrostelis Michener and Griswold, 1994b:676. Type species: Stelis aliena Cockerell, 1919, by original designation. [Hoplostelis]. Anthidiini.
- Autochelostoma Sladen, 1916a:270. Type species: Autochelostoma canadensis Sladen, 1916 = Alcidamea producta Cresson, 1864, monobasic. Isotypic with Alcidamea by synonymy. Osmiini.
- Avandrena Warncke, 1968:31. Type species: Andrena avara Warncke, 1967, by original designation. [Andrena]. Andreninae.
- Avpanurgus Warncke, 1972:70. Type species: Panurgus flavofasciatus Warncke, 1972, by original designation. [Panurgus]. Panurginae.
- Axestotrigona Moure, 1961:237. Type species: Melipona ferruginea Lepeletier, 1836, by original designation. Meliponini.
- Axillanthidium Pasteels, 1969a:39. Type species: Axillanthidium axillare Pasteels, 1969 = Anthidium ducale Morawitz, 1876, by original designation. Anthidiini.
- Aztecanthidium Michener and Ordway, 1964:70. Type species: Aztecanthidium xochipillium Michener and Ordway, 1964, by original designation. **Anthidiini**.
- Baana Sandhouse, 1943:530, replacement for Ctenopoda Ma, 1938. Type species: Apis fenestrata Fabricius, 1798, autobasic and by original designation. **Xylocopini.**
- Baeocolletes Michener, 1965a:70. Type species: Leioproctus calcaratus Michener, 1965, by original designation. [Leioproctus]. Colletinae.
- Barbata Méhelÿ, 1935:32, 138, not Humphrey, 1797. Type species: *Prosopis friesei* Alfken, 1904, monobasic. [Prosopis]. See *Mehelya* and *Mehelyana*. **Hylaeinae**.
- Bathanthidium Mavromoustakis, 1953:837. Type species: Dianthidium bifoveolatum Alfken, 1937, by original designation. [Dianthidium]. Anthidiini.
- Bekilia Benoist, 1962:220. Type species: Bekilia mimetica Benoist, 1962, by original designation. Osmiini?
- Belandrena Ribble, 1968b:221. Type species: Andrena nemophilae Ribble, 1968, by original designation. [Andrena]. Andreninae.
- Bellanthidium Pasteels, 1969a:38. Type species: Anthidium infuscatum Erichson, 1835, by original designation.

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- *Belopria* Moure, 1956:305. Type species: *Belopria zonata* Moure, 1956, by original designation. **Colletinae**.
- Benanthis Pasteels, 1969a:61. Type species: Anthidium madagascariensis Benoist, 1963, by original designation. Anthidiini.
- Berna Friese, 1911c:668. Type species: Berna africana Friese, 1911 (combination as though Berna were a genus) = Megachile africanibia Strand, 1912, monobasic. [Megachile]. Megachilini.
- Betheliella Cockerell, 1924b:169. Type species: Betheliella calocharti Cockerell, 1924, monobasic. Rophitinae.
- Biareolina Dours, 1873:288. Type species: Andrena neglecta Dours, 1873 = Andrena lagopus Latreille, 1809, designated by Sandhouse, 1943:530. Andreninae.
- Biastes Panzer, 1806:239. Type species: *Tiphia brevicornis* Panzer, 1798, monobasic. Isotypic with *Rhineta* by synonymy. **Biastini.**
- Biastoides Schenck, 1873:252. Type species: Pasites punctatus Schenck, 1870 = Phileremus emarginatus Schenck, 1853, monobasic. Biastini.
- Bicolletes Friese, 1908b:341 (p. 11 in reprint). Type species: Bicolletes neotropica Friese, 1908, by designation of Cockerell, 1915:342. Colletinae.
- Bicornelia Friese, 1899a:239. Type species: Bicornelia serrata Friese, 1899, monobasic. Dissoglottini.
- Biglossa Friese, 1906c:374. Type species: Biglossa thoracica Friese, 1906, by designation of Cockerell, 1914:328. Colletinae.
- Biglossidia Moure, 1948:313. Type species: Biglossa chalybaea Friese, 1906, by original designation. Colletinae.
- Biluna Ma, 1938:276. Type species: *Xylocopa nasalis* Westwood, 1842, by original designation. [Xylocopa]. **Xylocopini.**
- Binghamiella Cockerell, 1907c:235. Type species: Sphecodes antipodes Smith, 1853, monobasic. Colletinae.
- Birkmania Viereck, 1909:50. Type species: Birkmania andrenoides Viereck, 1909 = Panurginus polytrichus Cockerell, 1909, by original designation. Panurginae.
- Bluethgenia Pesenko, 1986a:136. Type species: Halictus dynastes Bingham, 1898, by original designation. [Lasioglossum]. Halictini.
- Bombias Robertson, 1903a:176. Type species: Bombias auricomus Robertson, 1903 = B. nevadensis auricomus (Robertson), by original designation. Isotypic with Boopobombus. Bombini.
- Bomboixylocopa Maa, 1939:155. Type species: Xylocopa bomboides Smith, 1879, by original designation. [Xylocopa]. Xylocopini.
- Bombomelecta Patton, 1879b:370. Type species: Melecta thoracica Cresson, 1876, monobasic. Melectini

- Bombus Latreille, 1802a:437. Type species: Apis terrestris Linnaeus, 1758, monobasic. A subsequent designation is Apis muscorum Linnaeus, 1758, by Westwood, 1840a:86; it was not an originally included species. Isotypic with Bremus Jurine, Bremus Panzer, Leucobombus, and Terrestribombus. Bombini.
- Bombusoides Motschulsky, 1856:28. Type species: Bombusoides mengei Motschulsky, 1856, monobasic. Fossil.
- Boopobombus Frison, 1927:62. Type species: Bombias auricomus Robertson, 1903 = B. nevadensis auricomus (Robertson), by designation of Williams, 1994:339. A sectional name that, according to the Code, 3rd ed., Art. 10(e), must be treated as a subgenus. Isotypic with Bombias. [Bombus]. Bombini.
- Boreocoelioxys Mitchell, 1973:37. Type species: Coelioxys rufitarsus Smith, 1854, by original designation. [Coelioxys]. Megachilini.
- Boreopsis Ikudome, 1991:790. Type species: Hylaeus macilentus Ikudome, 1989, by original designation. [Hylaeus]. Hylaeinae.
- Bothranthidium Moure, 1947a:23. Type species: Bothranthidium lauroi Moure, 1947, by original designation. Anthidiini.
- Brachyandrena Pittioni, 1948:54. Type species: Andrena colletiformis Morawitz, 1874, by original designation. [Andrena.] Andreninae.
- Brachycephalapis Viereck, 1909:47. Type species: Melitta californica Viereck, 1909, by original designation. Melittinae.
- Brachycephalibombus Williams, 1985:247. Type species: Bombus brachycephalus Handlirsch, 1888, by original designation. [Bombus]. Bombini.
- Brachyglossa Friese, 1922a:577, not Boisduval, 1829. Type species: Brachyglossa rufocaerulea Friese, 1922, monobasic. See Brachyglossula. Colletinae.
- Brachyglossula Hedicke, 1922:427, replacement for Brachyglossa Friese, 1922. Type species: Brachyglossa rufocaerulea Friese, 1922, autobasic. Colletinae.
- Brachyhesma Michener, 1965a:112. Type species: Euryglossina sulphurella Cockerell, 1913, by original designation. Euryglossinae.
- Brachymelecta Linsley, 1939a:458. Type species: Melecta mucida Cresson, 1879, by original designation. Melectini.
- Brachymelissodes LaBerge, 1956:926. Type species: Eucera cressonii Dalla Torre, 1896, by original designation. [Melissodes]. Eucerini.
- *Brachynomada* Holmberg, 1886b:233, 239, 272. Type species: *Brachynomada argentina* Holmberg, 1886, designated by Sandhouse, 1943:531. **Brachynomadini.**
- Brachyspatulariella Pittioni, 1950:79. Type species: Spatulariella helenae Pittioni, 1950, by original designation. [Prosopis]. **Hylaeinae.**
- Branthidium Pasteels, 1969a:88. Type species: Anthidium braunsi Friese, 1904, by original designation. Anthidiini.

- Brasilagapostemon Moure and Sakagami, 1984:4. Type species: Pseudagapostemon fluminensis Schrottky, 1911, monobasic. [Pseudagapostemon]. Halictini.
- Braunsapis Michener, 1969:290. Type species: Allodape facialis Gerstaecher, 1857, by original designation. [Allodape]. Allodapini.
- Bremus Jurine, 1801:164. Type species: Apis terrestris Linnaeus, 1758, by designation of Morice and Durrant, 1915:428. Invalidated by Commission Opinion 135, 1939. Isotypic with Bremus Panzer, Bombus, Leucobombus, and Terrestribombus. Bombini.
- Bremus Panzer, 1804a:19. Type species: Apis terrestris Linnaeus, 1758, by designation of Benson, Ferrière and Richards, 1937:93. Sandhouse's (1943) subsequent designation of Apis agrorum Fabricius, 1787, as the type species is invalid. Panzer (1804a, dated 1801 by Benson, Ferrière and Richards) did not include Apis terrestris, but he did include Bremus faciatus Panzer, Because Benson, Ferrière and Richards list that name as a synonym of Apis terrestris, the latter was available for designation as type species of Bremus Panzer [see the Code, 3rd ed., Art. 69(a)(v)]. I follow Sandhouse (1943) in the dating of Bremus Panzer; the real date of publication could have been from 1801 to 1804. Isotypic with Bombus, Bremus Jurine, Leucobombus, and Terrestribombus. Bombini.
- Bremus Kirby, 1837:272 footnote, not Panzer, 1804. Type species: *Apis rupestris* Fabricius, 1793, by designation of Milliron, 1961:59. Not replaced because a junior synonym of *Psithyrus*. Isotypic with *Psithyrus*. **Bombini**.
- Brevineura Michener, 1965a:224. Type species: Exoneura concinnula Cockerell, 1913, by original designation. [Exoneura]. Allodapini.
- Bythandrena Lanham, 1950:140, replacement for *Cryptandrena* Lanham, 1949. Type species: *Andrena carlini* Cockerell, 1901, autobasic. [Andrena]. **Andreninae.**
- Bytinskia Mavromoustakis, 1954:269. Type species: Bytinskia erythrogastra Mavromoustakis, 1954, by original designation. Osmiini.
- Cacosoma Smith, 1879:39, not Felder, 1874. Type species: Cacosoma discolor Smith, 1879, by original designation. See Neocorynura. Augochlorini.
- Cadeguala Reed, 1892:234. Type species: Colletes chilensis Spinola, 1851 = Colletes occidentalis Haliday, 1836, by designation of Sandhouse, 1943:532. **Diphaglossinae.**
- Cadegualina Michener, 1986b:187. Type species: Bicornelia andina Friese, 1925, by original designation. Diphaglossinae.
- Caenaugochlora Michener, 1954:76. Type species: Caenaugochlora macswaini Michener, 1954, by original designation. Augochlorini.
- Caenohalictus Cameron, 1903a:231. Type species: Caenohalictus trichiothalmus Cameron, 1903, monobasic. Halictini.
- Caenonomada Ashmead, 1899a:68. Type species: Caenonomada bruneri Ashmead, 1899, by original designation. Isotypic with Chacoana by synonymy. **Tapinotaspidini.**

- Caenoprosopina Roig-Alsina, 1987:312. Type species: Caenoprosopina holmbergi Roig-Alsina, 1987, by original designation. Caenoprosopidini.
- Caenoprosopis Holmberg, 1886b:235, no included species; 1887a:22, one included species. Type species: Caenoprosopis crabronina Holmberg, 1887, first included species. Isotypic with Austrodioxys by synonymy. Caenoprosopidini.
- Caerulosmia Zanden, 1988:123, nomen nudum.
- Caerulosmia Zanden 1989:83. Type species: Osmia gallarum Spinola, 1808, by original designation. [Osmia]. Osmiini.
- Caesarea Friese, 1911d:142. Type species: Anunobates depressa Friese, 1911, by designation of Sandhouse, 1943:532. [Ammobates]. Ammobatini.
- Calchalictus Warncke, 1975b:99. Type species: Apis calceata Scopoli, 1763, by original designation. [Halictus]. Halictini.
- Caliendra Gistel 1848:viii, unjustified replacement for Chrysantheda Perty, 1833. Type species: Chrysantheda nitida Perty, 1833 = Apis dentata Linnaeus, 1758, autobasic. Isotypic with Exaerete by synonymy. Euglossini.
- Callalictus Michener, 1965a:170. Type species: Parasphecodes tooloomensis Cockerell, 1929, by original designation. [Lasioglossum]. Halictini.
- Callandrena Cockerell, 1898b:186. Type species: Panurgus manifestus Fox, 1894, monobasic. Andreninae.
- Callanthidium Cockerell, 1925a:365. Type species: Anthidium illustre Cresson, 1879, by original designation. Anthidiini.
- Calleupetersia Cockerell, 1938:329. Type species: Halictus lasureus Friese, 1910, by original designation. Halictini.
- Callimelissodes LaBerge, 1961:294. Type species: Melissodes lupina Cresson, 1878, by original designation. [Melissodes]. Eucerini.
- Callinomada Rodeck, 1945:181. Type species: Nomada antonita Cockerell, 1909, by original designation. [Nomada]. Nomadini.
- Calliopsima Shinn, 1967:834. Type species: Calliopsis rozeni Shinn, 1967, by original designation. [Calliopsis]. Panurginae.
- Calliopsis Smith, 1853:128. Type species: Calliopsis andreniformis Smith, 1853, by designation of Ashmead,1899a: 85. Panurginae.
- Callistochlora Michener, new name, replacement for Callochlora Moure, 1964b:269, not Packard, 1864. Type species: Halictus chloris Spinola, 1851, autobasic. When informed of the homonymy, Padre J. S. Moure suggested the name here proposed but asked that I publish it. Augochlorini.
- Callobombus Dalla Torre, 1896:503, unjustified emendation of Kallobombus Dalla Torre, 1880. [Bombus]. Bombini.
- Calloceratina Cockerell, 1924d:77. Type species: Ceratina amabilis Cockerell, 1897 = C. exima Smith, 1862, by original designation. [Ceratina]. Ceratinini.
- Callochile Michener, 1962:27. Type species: Megachile ustulatiformis Cockerell, 1910 = Apis mystacea Fabricius, 1775, by original designation. [Megachile]. Megachilini.

- Callochlora Moure, 1964b:269, not Packard, 1864. Type species: *Halictus chloris* Spinola, 1851, by original designation. See *Callistochlora*, **Augochlorini**.
- Callocolletes Michener, 1965a:80. Type species: Trichocolletes pulcherrimus Michener, 1965, by original designation. [Trichocolletes]. Colletinae.
- Callohesma Michener, 1965a:95. Type species: Euryglossa calliopsiformis Cockerell, 1905, by original designation. [Euryglossa]. Euryglossinae.
- Callomacrotera Timberlake, 1954:413. Type species: Perdita maritima Timberlake, 1954, by original designation. [Perdita]. Panurginae.
- Callomegachile Michener, 1962:21. Type species: Chalicodoma mystaceana Michener, 1962, by original designation. [Chalicodoma]. Megachilini.
- Callomelecta Cockerell, 1926c:621. Type species: Callomelecta pendleburyi Cockerell, 1926, by original designation. Melectini.
- Callomelitta Smith, 1853:85. Type species: Callomelitta picta Smith, 1853, monobasic, Colletinae.
- Callonychium Brèthes, 1922:120. Type species: Callonychium argentinum Brèthes, 1922, monobasic. Panurginae.
- Calloprosopis Snelling, 1985:27. Type species: Hylaeus magnificus Cockerell, 1942, by original designation. Hylaeinae.
- Callorhiza Hirashima, 1989:2. Type species: Prosopis apicatus Smith, 1863, by original designation. [Palaeorhiza]. Hylaeinae.
- Callosphecodes Friese, 1909b:182. Type species: Sphecodes ralunensis Friese, 1909, monobasic. [Sphecodes]. Halictini.
- Calloxylocopa Hurd and Moure, 1963:142. Type species: Xylocopa tenuata Smith, 1874, by original designation. [Xylocopa]. Xylocopini.
- Calohoplitis Tkalců, 1995:129. Type species: Osmia laboriosa Smith, 1878, by original designation. [Hoplitis]. Osmiini.
- Calomelissa Hirashima and LaBerge, 1963, in Hirashima, 1963:241. Type species: Andrena prostomias Pérez, 1805, by original designation. [Andrena]. Andreninae.
- Calospiloma Brèthes, 1909b:68 footnote. Type species: Epeolus viperinus Holmberg, 1886, by original designation. Isotypic with Palinepeolus; isotypic with Isepeolus by synonymy. Isepeolini
- Calyptapis Cockerell, 1906a:41. Type species: Calyptapis florissantensis Cockerell, 1906, monobasic. Fossil,
- Camargoia Moure, 1989a:72. Type species: Camargoia camargoi Moure, 1989, by original designation. Meliponini.
- Campanularia Méhelÿ, 1935:157, not Lamarck, 1816. Invalid because no type species was designated; also homonym. [Prosopis]. See *Paraprosopis*. **Hylaeinae**.
- Camptopaeum Spinola, 1851:192, unjustified emendation of Camptopoeum Spinola, 1843. Panurginae.
- Camptopoeum Spinola, 1843:139. Type species: Prosopis frontalis Fabricius, 1804, by original designation. Panurginae.

- Campylogaster Dours, 1873:286. Type species: Campylogaster fulvo-crustatus Dours, 1873 = Andrena erberi Morawitz, 1871, designated by Sandhouse, 1943:534. Andreninae.
- Canephora Friese, 1908b:94, not Hübner, 1822, replacement for Corbicula Friese, 1908. Type species: Corbicula apiformis Friese, 1908, autobasic, See Canephorula. Eucerini.
- Canephorula Jörgensen, 1909:212, replacement for Canephora Friese, 1908. Type species: Corbicula apiformis Friese, 1908, autobasic. Eucerini.
- Capanthidium Pasteels, 1969a:85. Type species: Anthidium "capicole Friese," lapsus for capicola Brauns, 1905, by original designation. Anthidiini.
- *Capicola* Friese, 1911a:672. Type species: *Capicola braunsiana* Friese, 1911, monobasic. **Dasypodinae**.
- Capicoloides Michener, 1981:83. Type species: Capicola aliciae Cockerell, 1932, by original designation. [Capicola]. Dasypodinae.
- *Caposmia* Peters, 1984:378. Type species: *Osmia braunsi* Peters, 1984, by original designation. [Osmia]. **Osmiini.**
- Carandrena Warncke, 1968:94. Type species: Andrena aerinifrons Dours, 1873, by original designation. [Andrena]. Andreninae.
- Caranthophora Brooks, 1988:470. Type species: Anthophora dufourii Lepeletier, 1841, by original designation. [Anthophora]. Anthophorini.
- Carinanthidium Pasteels, 1969a:42. Type species: Megachile cariniventris Friese, 1904, by original designation. Anthidiini.
- Carinapis Stage, 1981, in Michener, 1981:98. Type species: Hesperapis carinata Stevens, 1919, by original designation. [Hesperapis]. Dasypodinae.
- Carinella Pasteels, 1965:447, not Johnston, 1833. Type species: Megachile torrida Smith, 1853, by original designation. [Chalicodoma]. See Carinula. Megachilini.
- Carinellum Pasteels, 1969a:80. Type species: Anthidium ochrognathum Alfken, 1932, by original designation. [Pseudoanthidium]. Anthidiini.
- Carinorophites Warncke, 1979:136. Type species: Dufourea rufiventris Friese, 1898, by original designation. [Rophites]. Rophitinae.
- Carinula Michener, McGinley, and Danforth, 1994:174, replacement for Carinella Pasteels, 1965, Type species: Megachile torrida Smith, 1853, autobasic. [Megachile]. Megachilini.
- Carloticola Moure and Urban, 1990:90. Type species: Dianthidium paraguayense Schrottky, 1908, by original designation. Anthidini.
- Catoceratina Vecht, 1952:30. Type species: Ceratina perforatrix Smith, 1879, by original designation. [Ceratina]. Ceratinini.
- Caupolicana Spinola, 1851:212. Type species: Caupolicana gayi Spinola, 1851, designated by Sandhouse, 1943:534. Caupolicanini.
- Caupolicania Schulz, 1906:238, unjustified emendation of Caupolicana Spinola, 1851. Caupolicanini.

- Caupolicanoides Michener, 1966a:725. Type species: Caupolicana pubescens Smith, 1879, by original designation. Caupolicanini.
- Ceblurgus Urban and Moure, 1993:102. Type species: Ceblurgus longipalpis Urban and Moure, 1993, by original designation. Rophitinae.
- Celetandrena LaBerge and Hurd, 1965:188. Type species: Andrena vinnula LaBerge and Hurd, 1965, by original designation. [Andrena]. Andreninae.
- Celetrigona Moure, 1950a:246. Type species: Trigona longicornis Friese, 1903, by original designation. [Hypotrigona]. Meliponini.
- Cellaria Friese, 1913a:575, not Ellis and Solander, 1786. Type species: Nomioides arnoldi Friese, 1913 = Nomioides somalica Magretti, 1899, monobasic. [Nomioides]. See Cellariella. Nomioidinae.
- Cellariella Strand, 1926:53, replacement for Cellaria Friese, 1913. Type species: Nomioides arnoldi Friese, 1913 = Nomioides somalica Magretti, 1899, autobasic. [Nomioides]. Nomioidinae.
- Cemolobus Robertson, 1902b:324. Type species: Xenoglossa ipomoeae Robertson, 1891, by original designation. Eucerini.
- Centrias Robertson, 1903d:174, 176. Type species: Nomada erigeronis Robertson, 1897, by original designation. Nomadini.
- Centris Fabricius, 1804:354. Type species: Apis haemorrhoidalis Fabricius, 1775, designation by Commission Opinion 567 (1959). The designation of Apis dimidiata Fabricius, 1793, a euglossine bee, by Blanchard, 1840:405, and the designation of Apis hirtipes Fabricius, 1793 = Apis rustica Olivier, 1789, by Blanchard, 1849:pl. 128 bis (1846), are invalidated. Isotypic with Hemisia. Centridini.
- Centrosmia Robertson, 1903a:165, 166. Type species: Osmia bucephala Cresson, 1864, by original designation. Osmiini.
- Cephalapis Cockerell, 1910e:23. Type species: Chelostoma jacintanum Cockerell, 1910, monobasic. [Chelostoma]. Osmiini.
- Cephalictoides Cockerell, 1924c:244. Type species: Halictoides paradoxus Morawitz, 1867, by original designation. [Halictoides]. Rophitinae.
- Cephalocolletes Michener, 1989:656. Type species: Biglossa laticeps Friese, 1906, by original designation. [Leioproctus]. Colletinae.
- Cephalosmia Sladen, 1916a:270. Type species: Osmia armaticeps Cresson, 1878 = Osmia montana Cresson, 1864, monobasic. Osmiini.
- Cephalotrigona Schwarz, 1940:10. Type species: Trigona capitata Smith, 1854, by original designation. [Trigona]. Meliponini.
- Cephalurgus Moure and Lucas de Oliveira, 1962:2. Type species: Cephalurgus anomalus Moure and Lucas de Oliveira, 1962, by original designation. Panurginae.

- Cephalylaeus Michener, 1942:273. Type species: Prosopis basalis Smith, 1853, by original designation. [Hylaeus]. Hylaeinae.
- Cephen Robertson, 1903d:174, 176. Type species: Nomada texana Cresson, 1872, by original designation. Nomadini.
- Cephylaeus Moure, 1972:280. Type species: Hylaeus larocai Moure, 1972, by original designation. [Hylaeus]. Hylaeinae.
- Ceraheriades Tkalců,1984a:5. Type species: Archeriades petersi Tkalců, 1984, by original designation. [Archeriades]. Osmiini.
- Ceraplastes Gistel, 1848:x, unjustified replacement for Stelis Panzer, 1806. Type species: Apis aterrima Panzer, 1798, not Christ, 1791 = Apis punctulatissima Kirby, 1802, autobasic. Isotypic with Gymnus, Stelis, Trachusa Jurine, and Gyrodroma Klug. Anthidiini.
- Ceratalictus Moure, 1943b:463. Type species: Oxystoglossa theia Schrottky, 1911, by original designation. Augochlorini.
- Ceratias Robertson, 1903a:172, not Kroyer, 1845. Type species: Megachile pugnatus Say, 1837, by original designation. See Sayapis. Isotypic with Gnathocera by synonymy. Megachilini.
- Ceratina Latreille, 1802b:380. Type species: Hylaeus albilabris Fabricius, 1793 = Apis cucurbitina Rossi, 1792, monobasic. Westwood, 1840a:85, designated Apis coerulea Villers, 1789, and Blanchard, 1840:409, designated Apis callosa Fabricius, 1794, as the type species. Placed on Official List of Generic Names in Zoology, Opinion 1011 of the Commission (1973). Isotypic with Clavicera. Ceratinini.
- *Ceratinidia* Cockerell and Porter, 1899:406. Type species: *Ceratina hieroglyphica* Smith, 1854, by original designation. [Ceratina]. **Ceratinini.**
- Ceratinula Moure, 1941a:78. Type species: Ceratina lucidula Smith, 1854, by original designation. Ceratinini.
- Ceratocolletes Michener, 1965a:63. Type species: Lamprocolletes antennatus Smith, 1879, by original designation. [Leioproctus]. Colletinae.
- Ceratomonia Michener, 1981:20. Type species: Ceratomonia rozenorum Michener, 1981, by original designation. Meganomiinae.
- Ceratopsithyrus Pittioni, 1949:270. Type species: Psithyrus klapperichi Pittioni, 1949 = Psithyrus cornutus Frison, 1933, monobasic. [Psithyrus]. Bombini.
- Ceratorhiza Hirashima, 1978:81. Type species: Palaeorhiza conica Michener, 1965, by original designation. [Palaeorhiza]. **Hylaeinae.**
- Ceratosmia Thomson, 1872:232. Type species: Apis bicornis Linnaeus, 1758 = Apis rufa Linnaeus, 1758, designated by Sandhouse,1939: 9. [Osmia]. Isotypic with Osmia and Amblys; isotypic with Pachyosmia by synonymy. Osmiini.
- Cercorhiza Hirashima, 1982b:88. Type species: Palaeorhiza gressittorum Hirashima, 1975, by original designation. [Palaeorhiza]. Hylaeinae.
- Cerianthidium Friese, 1923:304. Type species: Trachusa strigata Panzer, 1805, by designation of Cockerell, 1925a:361. [Anthidium]. Isotypic with Anthidiellum. Anthidiini.

- Ceroliopoeum Ruz, 1991:237. Type species: Camptopoeum laetum Vachal, 1909, by original designation. [Calliopsis]. Panurginae.
- Cestella Pasteels, 1965:547. Type species: Megachile cestifera Benoist, 1954, by original designation. [Chalicodoma]. Megachilini.
- Ceylalictus Strand, 1913a:137. Type species: Halictus horni Strand, 1913, monobasic. [Halictus]. Nomioidinae.
- Ceylonicola Friese, 1918:501. Type species: Ceylonicola atra Friese, 1918 = Sudila bidentata Cameron, 1898, by designation of Sandhouse, 1943:536. Isotypic with Sudila by synonymy. Halictini.
- Chacoana Holmberg, 1887b: 225, nomen nudum. Tapinotaspidini.
- Chacoana Holmberg, 1903:432. Type species: Chacoana melanoxantha Holmberg, 1903 = Caenonomada bruneri Ashmead, 1899, monobasic. Isotypic with Caenonomada by synonymy. Tapinotaspidini.
- Chaetalictus Michener, 1978a:509. Type species: Halictus pearstonensis Cameron, 1905, by original designation. [Patellapis]. Halictini.
- Chaetochile Mitchell, 1980:63. Type species: Cressoniella golbachi Schwimmer, 1980, by original designation. [Cressoniella]. Megachilini.
- Chaetohesma Exley, 1978:373. Type species: Chaetohesma tuberculata Exley, 1978, by original designation. Euryglossinae.
- Chaetostetha Michener, 1942:281. Type species: Exomalopsis pyropyga Friese, 1925, by original designation. Tapinotaspidini.
- Chaeturginus Lucas de Oliveira and Moure, 1963:575. Type species: Rhophitulus testaceus Ducke, 1907, by original designation. Panurginae.
- Chalcobombus Cockerell, 1908d:326. Type species: Chalcobombus humilis Cockerell, 1908, designated by Cockerell, 1909e:11. Fossil.
- Chalcosmia Schmiedeknecht, 1885:20. Type species: Apis fulviventris Panzer, 1798 (not Scopoli, 1763) = Apis niveata Fabricius, 1804, by designation of Sandhouse, 1939:13. [Osmia]. Osmiini.
- Chalepogenoides Michener, 1942:279. Type species: Chalepogenus leucostoma Cockerell, 1923, by original designation. **Tapinotaspidini.**
- Chalepogenus Holmberg, 1903:416. Type species: Chalepogenus incertus Holmberg, 1903 = Tetrapedia muelleri Friese, 1899, by designation of Sandhouse, 1943:537. Sandhouse considered Chalepogenus to be monobasic, but Holmberg named two "varieties" of C. incertus, and thus included three taxa. Isotypic with Desmotetrapedia by synonymy. Tapinotaspidini.
- Chalicodoma Lepeletier, 1841:309. Type species: Apis muraria Olivier, 1789 (as Xylocopa muraria Fabricius, 1804) = Apis parietina Fourcroy, 1785, by designation of Girard, 1879:778. Megachilini.

- Chalicodomoides Michener, 1962:24. Type species: Megachile aethiops Smith, 1853, by original designation. [Chalicodoma]. Megachilini.
- Charitandrena Hedicke, 1933:210. Type species: Nomada hattorfiana Fabricius, 1775, by original designation. [Andrena]. Andreninae.
- Chaulandrena LaBerge, 1964:314. Type species: Andrena porterae Cockerell, 1900, by original designation. [Andrena]. Andreninae.
- Cheesmania Hirashima, 1981b:27. Type species: Palaeorhiza amabilis Hirashima, 1981, by original designation. [Palaeorhiza]. Hylaeinae.
- Chelostoma Latreille, 1809:161. Type species: Apis maxillosa Linnaeus, 1767 = Apis florisomnis Linnaeus, 1758, monobasic, Osmiini.
- Chelostomoda Michener, 1962:24. Type species: Megachile spissula parvula Strand, 1913 = M. spissula Cockerell, 1911, by original designation. [Chalicodoma]. Megachilini.
- Chelostomoidella Snelling, 1990:36. Type species: Megachile spinotulata Mitchell, 1934, by original designation. [Chalicodoma]. Megachilini.
- Chelostomoides Robertson, 1901:231. Type species: Megachile rufimanus Robertson, 1891 = Chelostoma rugifrons Smith, 1854, monobasic. Megachilini.
- Chelostomopsis Cockerell, 1925b:205. Type species: Chelynia rubifloris Cockerell, 1898, by original designation. Isotypic with Raphidostoma by synonymy. Osmiini.
- Chelynia Provancher, 1888:322. Type species: Chelynia labiata Provancher, 1888, monobasic. Anthidiini.
- Chenosmia Sinha, 1958:233. Type species: Osmia penstemonis Cockerell, 1906, by original designation. Osmiini.
- Chilalictus Michener, 1965a:174. Type species: Halictus subinclinans Cockerell, 1915, by original designation. [Lasioglossum]. Halictini.
- Chilicola Spinola, 1851:210. Type species: Chilicola rubriventris Spinola, 1851, by designation of Sandhouse, 1943:537. Xeromelissinae.
- Chilicolletes Michener, 1989:640. Type species: Leioproctus delahozii Toro, 1973, by original designation. [Leioproctus]. Colletinae.
- Chilimalopsis Toro, 1976:73. Type species: Chilimalopsis parvula Toro, 1976, by original designation. Exomalopsini.
- *Chilimelissa* Toro and Moldenke, 1979:149. Type species: *Chilimelissa luisa* Toro and Moldenke, 1979, by original designation. **Xeromelissinae**.
- Chilicola and Moldenke, 1979:104. Type species: Chilicola andina Toro and Moldenke, 1979, by original designation. [Chilicola]. Xeromelissinae.
- Chilosima Michener, 1939:78. Type species: Ashmeadiella rhodognatha Cockerell, 1924, by original designation. [Ashmeadiella]. Osmiini.
- Chlerogas Vachal, 1904:127. Type species: Halictus chlerogas Vachal, 1904, monobasic and absolute tautonomy. Augochlorini.

- Chlerogella Michener, 1954:75. Type species: Chlerogella elongaticeps Michener, 1954, by original designation. Augochlorini.
- Chloralictus Robertson, 1902c:245, 248. Type species: Halictus cressoni Robertson, 1890, by original designation. Halictini.
- Chlorandrena Pérez, 1890:172. Type species: Andrena humilis Imhoff, 1832, by designation of Hedicke, 1933:211. [Andrena]. Andreninae.
- Chloranthidiellum Mavromoustakis, 1963b:491. Type species: Anthidium flavescens Friese, 1925, by original designation. [Anthidiellum]. Anthidiini.
- Chloranthidium Pasteels, 1969a:48, lapsus for Chloranthidiellum Mayromoustakis, 1963. [Anthidiellum]. Anthidiini.
- Chloroceratina Cockerell, 1918a:143. Type species: Ceratina cyanura Cockerell, 1918, by original designation. [Ceratina]. Ceratinini.
- Chlorosmia Sladen, 1916a:270. Type species: Osmia fulgida Cresson, 1864, monobasic. Osmiini.
- Chromobombus Dalla Torre, 1880:40. Type species: Apis muscorum Linnaeus, 1758, by designation of Sandhouse, 1943:538. [Bombus]. Bombini.
- *Chrysandrena* Hedicke, 1933:211. Type species: *Apis fulvago* Christ, 1791, by original designation. [Andrena]. **Andreninae**.
- Chrysantheda Perty, 1833:147. Type species: Chrysantheda nitida Perty, 1833 = Apis dentata Linnaeus, 1758, monobasic. Isotypic with Caliendra; isotypic with Exaerete by synonymy. Euryglossini.
- Chrysocolletes Michener, 1965a:71. Type species: Paracolletes moretonianus Cockerell, 1905, by original designation. [Leioproctus]. Colletinae.
- Chrysopheon Titus, 1901:256. Type species: Chrysopheon aurifuscus Titus, 1901, monobasic. Dioxyini.
- Chrysosarus Mitchell, 1943:664. Type species: Megachile guaranitica Schrottky, 1908, by original designation. [Megachile]. Megachilini.
- Cilissa Leach, 1815:155. Type species: Andrena haemorrhoidalis Fabricius, 1775, by designation of Westwood, 1840a:84. Melitta tricincta Kirby, 1802, was designated subsequently by Taschenberg, 1883:52. Melittinae.
- Cingulata Méhelÿ, 1935:43, 149. Type species: Vespa pratensis Geoffroy, 1785 (not Miller, 1759) = Sphex signata Panzer, 1798, monobasic. [Prosopis]. Isotypic with Prosopis by synonymy. Hylaeinae.
- *Cirroxylocopa* Hurd and Moure, 1963:102. Type species: *Xylocopa vestita* Hurd and Moure, 1963, by original designation. [Xylocopa]. **Xylocopini.**
- Citrinopsithyrus Thorp, 1983, in Thorp, Horning and Dunning, 1983:50. Type species: Apathus citrinus Smith, 1854, by original designation. Substitute for Laboriopsithyrus Frison, 1927, the type species of which turns out to be an anthophorine bee of the genus Habropoda. Bombini.

- Cladocerapis Cockerell, 1904b:292. Type species: Lamprocolletes cladocerus Smith, 1862 = Lamprocolletes bipectinatus Smith, 1856, by original designation. Colletinae.
- Claremontiella Cockerell 1933c:26. Type species: Spinoliella euxantha Cockerell, 1916 = Calliopsis zonalis Cresson, 1879, by original designation. [Spinoliella]. Isotypic with Nomadopsis by synonymy. Panurginae.
- Clavicera Latreille, 1802a:432. Type species: *Hylaeus albilabris* Fabricius, 1793 = *Apis cucurbitina* Rossi, 1792, monobasic. Suppressed by Commission Opinion 1011 (1973). Isotypic with *Ceratina*. Ceratinini.
- Clavinomia Warncke, 1980:372. Type species: Nomia clavicornis Warncke, 1980, by original designation. [Nomia]. Nomiinae.
- Clavipanurgus Warncke 1972:95. Type species: Panurgus clavatus Warncke, 1972, by original designation. [Panurgus]. Panurginae.
- Cleptotrigona Moure, 1961:219. Type species: Lestrimelitta cubiceps Friese, 1912, by original designation. [Lestrimelitta]. Meliponini.
- Clisodon Patton, 1879a:479. Type species: Anthophora terminalis Cresson, 1869, by original designation. Anthophorini.
- Clistanthidium Michener and Griswold, 1994a:315. Type species: Dianthidium turnericum Mavromoustakis, 1934, by original designation. [Eoanthidium]. Anthidiini.
- Clypanthidium Pasteels, 1968a:1060. Type species: Anthidium ruficeps Friese, 1914, by original designation. Also described as new by Pasteels, 1969a:53. [Bathanthidium]. Anthidiini.
- Cnemidandrena Hedicke, 1933:213. Type species: Melitta nigriceps Kirby, 1802, by original designation. [Andrena]. Andreninae.
- Cnemidium Perty, 1833:148, not Goldfuss, 1826. Type species: Cnemidium viride Perty, 1833, monobasic. See Euglossella. Euglossini.
- Cnemidorhiza Hirashima, 1981a:1. Type species: *Prosopis elegans* Smith, 1864 = *Prosopis elegantissima* Dalla Torre, 1896, by original designation. [Palaeorhiza]. **Hylaeinae.**
- Coccineobombus Skorikov, 1922b:157. Type species: Bombus coccineus Friese, 1903, by designation of Sandhouse, 1943:539. [Alpigenobombus]. Bombini.
- Cockerellia Ashmead, 1898:284. Type species: Perdita hyalina Cresson, 1878 = Perdita albipennis Cresson, 1865, by original designation. Panurginae.
- Cockerellula Strand, 1932:196, replacement for Lutziella Cockerell, 1922. Type species: Perdita opuntiae Cockerell, 1922, autobasic. Panurginae.
- Coelioxita Pasteels, 1977:180. Type species: Coelioxys afra Lepeletier, 1841, by original designation. Isotypic with Allocoelioxys. Megachilini.
- Coelioxoides Cresson, 1878:94. Type species: Coelioxoides punctipennis Cresson, 1878, monobasic. **Tetrapediini.**

- Coelioxula Pasteels, 1982:110. Type species: Coelioxys rufocaudata Smith, 1854 = Coelioxys ruficauda Lepeletier, 1841, by original designation. Megachilini.
- Coelioxys Latreille, 1809:166. Type species: Apis conica Linnaeus, 1758 = Apis quadridentata Linnaeus, 1758, by designation of Curtis, 1831, pl. 349 and Westwood, 1840a:85. Latreille's designation, 1810:439, is not acceptable because he listed two species names, not indicating that they were synonyms. He treated them as he treated dissimilar species in certain other cases, e.g., Centris. Megachilini.
- Colax Lepeletier and Serville, 1825:4, 213, nomen nudum.
- Colax Lepeletier and Serville, 1828:448, not Hübner, 1819. Type species: Rhathymus bicolor Lepeletier and Serville, 1828, monobasic. Colax was shown as a synonym of Rhathymus. It is not only a junior homonym of Colax Hübner but is not available according to the Code, ed. 3, Art. 11(e) because it was proposed in synonymy. Isotypic with Rhathymus; isotypic with Liogastra by synonymy. Rhathymini.
- Colletellus Michener, 1965a:70. Type species: Andrenopsis velutinus Cockerell, 1929 (not Paracolletes velutinus Cockerell, 1929, homonym in Leioproctus) = Leioproctus velutinellus Michener, 1965, by original designation. [Leioproctus]. Colletinae.
- Colletes Latreille, 1802a:423. Type species: Apis succincta Linnaeus, 1758, monobasic. Colletes hirta Lepeletier and Serville, 1825 = Apis cunicularia Linnaeus, 1758, designated as type by Blanchard, 1849, pl. 125 (1847), was not originally included. Isotypic with Evodia by synonymy. Colletinae.
- Colletopsis Michener, 1965a:58. Type species: Leioproctus contrarius Michener, 1965, by original designation. [Leioproctus]. Colletinae.
- Colocynthophila Moure, 1948:342. Type species: Tetralonia fervens Smith, 1879, by original designation. [Peponapis]. Eucerini.
- Comeptila Moure and Michener, 1955b:304. Type species: Thyreothremma paraguayensis Brèthes, 1909, by original designation. [Melissoptila]. Eucerini.
- Compsoclepta Moure, 1995:143. Type species: Compsoclepta fasciata Moure, 1995 = Osirinus lemniscatus Roig-Alsina, 1989, by original designation. This synonymy was indicated by D. Urban in litt. (1996). Isotypic with Osirinus by synonymy. Osirini.
- Compsomelissa Alfken, 1924:251. Type species: Compsomelissa borneri Alkfen, 1924, monobasic. Isotypic with Exoneurula by synonymy. Allodapini.
- Conandrena Viereck, 1924:20. Type species: Andrena bradleyi Viereck, 1907, by original designation. [Andrena]. Andreninae.
- Conanthalictus Cockerell, 1901b:209. Type species: Halictus conanthi Cockerell, 1901, monobasic. [Halictus]. Rophitinae.
- Confusibombus Ball, 1914:78. Type species: Bombus confusus Schenck, 1859, monobasic. [Bombus]. Isotypic with Sulcobombus and Confusobombus. Bombini.

- Confusobombus Skorikov, 1922b:156. Type species: Bombus confusus Schenck, 1859, by designation of Richards, 1968:214. Isotypic with Sulcobombus and Confusibombus. Bombini.
- Congotrachusa Pasteels, 1969a:24. Type species: Anthidium schoutedeni Vachal, 1910, by original designation. [Trachusa]. Anthidiini.
- Conohalictoides Viereck, 1904a:245; also described as new in 1904b:261. Type species: Conohalictoides lovelli Viereck, 1904 = Panurgus novaeangliae Robertson, 1897, by original designation. Rophitinae.
- Copoxyla Maa, 1954:211. Type species: "Apis iris Christ," 1791 = Xylocopa cyanescens Brullé, 1832, by original designation. Christ's work is largely binominal but a section on bees is trinominal and the names published there are not valid. Nonetheless the identity of the type species was clearly indicated by Maa's designation using a common appellation, iris Christ, for the species concerned. [Xylocopa]. Xylocopini.
- Coptepeolus Moure, 1955:120. Type species: Coptepeolus emarginatus Moure, 1955, by original designation. **Epeolini.**
- Coptorthosoma Pérez, 1901:3, unjustified emendation of Koptortosoma Gribodo, 1894. **Xylocopini.**
- Coquillettapis Viereck, 1909:47. Type species: Coquillettapis melittoides Viereck, 1909 = Melissodes nigrifrons Cresson, 1878, by original designation. Emphorini.
- Corbicula Friese, 1908b:59, also 1908c:170, not Megerle, 1811. Type species: Corbicula apiformis Friese, 1908, monobasic. See Canephorula. Eucerini.
- Cordandrena Warncke, 1968:63. Type species: Andrena cordialis Morawitz, 1878, by original designation. [Andrena]. Andreninae.
- *Cornylaeus* Snelling, 1985:8. Type species: *Prosopis aterrima* Friese, 1911, by original designation. [Hylaeus]. **Hylaeinae.**
- Corynogaster Sichel, 1867:146. Type species: Corynura gayi Spinola, 1851 = Halictus rubellus Haliday, 1836, designated by Daly. Michener, Moure, and Sakagami, 1987:104; these authors explained the invalidity of Sandhouse's (1943:540) designation due to her confusion of Halictus gayi Spinola and Corynura gayi Spinola. Isotypic with Corynura, Augochlorini.
- Corynura Spinola, 1851:296. Type species: Corynura gayi Spinola, 1851 = Halictus rubellus Haliday, 1836, designated by Alfken, 1926a:146. Sandhouse, 1943:540, subsequently designated the same species. Isotypic with Corynogaster. Augochlorini.
- Corynurella Eickwort, 1969:398. Type species: Corynurella mourei Eickwort, 1969, by original designation. Augochlorini.
- Corynuroides Sandhouse. 1943:540, replacement for Corynuropsis Cockerell, 1901. Type species: Corynura darwini Cockerell, 1901 = Augochlora briseis Smith, 1879, autobasic. Augochlorini.
- Corynuropsis Cockerell, 1901a:220, not Scott, 1894. Type species: Corynura darwini Cockerell, 1901 = Augochlora briseis

- Smith, 1879, by original designation. [Corynura]. See *Corynuroides*, Augochlorini.
- Corythochila Michener, 1939:74. Type species: Ashmeadiella inyoensis Michener, 1939, by original designation. [Ashmeadiella]. Osmiini.
- Crawfordapis Moure, 1964a:448. Type species: Megacilissa luctuosa Smith, 1861, by original designation. [Zikanapis]. Caupolicanini.
- Creightonella Cockerell, 1908b:146. Type species: Megachile mitimia Cockerell, 1908 = Megachile cognata Smith, 1853, by original designation. [Megachile]. Megachilini.
- Creightoniella Pasteels, 1965:10, error for Creightonella Cockerell, 1908. Megachilini.
- Cremnandrena LaBerge, 1986:554. Type species: Andrena anisochlora Cockerell, 1936, by original designation. [Andrena]. Andreninae.
- Cressoniella Mitchell, 1934:307. Type species: Megachile "zapoteka Cresson" = M. zapoteca Cresson, 1878, by original designation. [Megachile]. Megachilini.
- Crewella Cockerell, 1903b:202. Type species: Ceratina titusi Cockerell, 1903, by original designation. [Ceratina]. Ceratinini.
- Crinoglossa Friese, 1925b:502. Type species: Crinoglossa natalensis Friese, 1925, monobasic. Nomiinae.
- Crocisa Jurine, 1801:164. Type species: Nomada scutellata Jurine, 1801 = Melecta histrionica Illiger, 1806, by designation of Morice and Durrant, 1915:423. Invalidated by Commission Opinion 135 (1939). Melectini.
- Crocisa Jurine, 1807:239. Type species: Nomada histrio Fabricius, 1775, by designation of Latreille, 1810:439. Nomada scutellaris Fabricius, 1781, was designated by Michener, 1965a:218. Crocisa ramosa Lepeletier, 1841, was designated as type species by Blanchard, 1849:pl. 128 (1847) but was not originally included. Melectini.
- Crocisaspidia Ashmead, 1899a:68. Type species: Crocisaspidia chandleri Ashmead, 1899, by original designation. Nomiinae.
- Crocissa Panzer, 1806:263. Type species: Nomada scutellaris Fabricius, 1781, by designation of Sandhouse, 1943:541. This name was published as a synonym of *Thyreus* and was credited to Jurine; presumably it was an error for *Crocisa*. Isotypic with *Thyreus*. **Melectini**.
- Crotchiibombus Franklin, 1954:51. Type species: Bombus crotchii Cresson, 1878, by original designation. [Bombus]. Bombini.
- Cryptandrena Pittioni, 1948:49, not Lanham, 1949. Type species: Andrena ventricosa Dours, 1873, by original designation. [Andrena]. Andreninae.
- *Cryptandrena* Lanham, 1949:222, not Pittioni, 1948. Type species: Andrena *carlini* Cockerell, 1901, by original designation. [Andrena]. See *Bythandrena*. **Andreninae**.
- Cryptohalictoides Viereck, 1904b:261. Type species: Cryptohalictoides spiniferus Viereck, 1904, by original designation. Rophitinae.

- Cryptosmia Yasumatsu and Hirashima, 1950:14. Type species: Osmia satoi Yasumatsu and Hirashima, 1950, by original designation. [Osmia]. Osmiini.
- Ctenanthidium Urban, 1993:85. Type species: Ctenanthidium gracile Urban, 1991, by original designation. Anthidiini.
- Ctenaugochlora Eickwort, 1969:435. Type species: Neocorynura perpectinata Michener, 1954, by original designation. [Caenaugochlora]. Augochlorini.
- Ctenioschelus Romand, 1840:336. Type species: Acanthopus goryi Romand, 1840, monobasic. Taschenberg, 1883:78, designated as type species Melissoda latreillei Lepeletier, 1841 = Acanthopus goryi Romand, 1840. Isotypic with Ischnocera and Melissoda by synonymy. Ericrocidini.
- Ctenoapis Cameron, 1901a:116. Type species: Ctenoapis lutea Cameron, 1901, by designation of Sandhouse, 1943:542. Pararhophitini.
- Ctenoceratina Daly and Moure, 1988, in Daly, 1988:12. Type species: Ceratina armata Smith, 1854, by original designation. Ceratinini.
- Ctenocolletes Cockerell, 1929c:358. Type species: Stenotritus nicholsoni Cockerell, 1929, monobasic. [Stenotritus]. Stenotritidae.
- Ctenocorynura Schrottky, 1914:628. Type species: Ctenocorynura vernoniae Schrottky, 1914 = Halictus inflaticeps Ducke, 1906, by original designation. Isotypic with Rhinocorynura by synonymy. Augochlorini.
- Ctenonomia Cameron, 1903b:178. Type species: Ctenonomia carinata Cameron, 1903, monobasic. Halictini.
- Ctenoplectra Kirby, 1826, in Kirby and Spence, 1826:681, no species. Type species: Ctenoplectra chalybea Smith, 1858, by inclusion and designation of Sandhouse, 1943:542. Isotypic with Ctenoplectra Smith. Ctenoplectrini.
- Ctenoplectra Smith, 1858:44. Type species: Ctenoplectra chalybea Smith, 1858, monobasic. Homonym and synonym of Ctenoplectra Kirby, 1826. Isotypic with Ctenoplectra Kirby. Ctenoplectrini.
- Ctenoplectrella Cockerell, 1909d:314; also described as new by Cockerell, 1909e:19. Type species: Ctenoplectrella viridiceps Cockerell, 1909, monobasic. Fossil.
- Ctenoplectrina Cockerell, 1930a:360. Type species: Ctenoplectra politula Cockerell, 1930, monobasic. [Ctenoplectra]. Ctenoplectrini.
- Ctenopoda Ma, 1938:285, not McAtee and Malloch, 1933. Type species: Apis fenestrata Fabricius, 1798, by original designation. [Xylocopa]. See Ctenoxylocopa Michener and Baana Sandhouse. Xylocopini.
- Ctenosibyne Moure, 1956:311. Type species: Lonchopria cingulata Moure, 1956, by original designation. [Lonchopria]. Colletinae.
- Ctenosmia Thomson, 1872:233. Type species: Apis adunca Panzer, by designation of Michener, 1941:158. Isotypic with Hoplitis. Osmiini.
- Ctenoxylocopa Michener, 1942:282, replacement for Ctenopoda Ma, 1938. Type species: Apis fenestrata Fabricius, 1798, autobasic. [Xylocopa]. Xylocopini.

- Cubiandrena Warncke, 1968:76. Type species: Andrena cubiceps Friese, 1914, by original designation. [Andrena]. Andreninae.
- Cubitalia Friese, 1911d:136. Type species: Eucera breviceps Friese, 1911, monobasic. [Eucera]. Eucerini.
- Cubitognatha Michener, 1939:81. Type species: Ashmeadiella xenomastax Michener, 1939, by original designation. [Ashmeadiella]. Osmiini.
- Cullumanibombus Skorikov, 1938a:145, unjustified emendation of Cullumanobombus Vogt, 1911. Bombini.
- Cullumanobombus Vogt, 1911:57. Type species: Apis cullumana Kirby, 1802, by designation of Frison, 1927:66. [Bombus]. Bombini.
- Curtisapis Robertson, 1918a:91. Type species: Halictus coriaceus Smith, 1853, by original designation. Halictini.
- Curvinomia Michener, 1944:251. Type species: Nomia californiensis Michener, 1937 = Nomia tetrazonata Cockerell, 1910, by original designation. [Nomia]. Nomiinae.
- Cuspidella Pasteels, 1965:544. Type species: Chalicodoma quadraticauda Pasteels, 1965, by original designation. [Chalicodoma]. Megachilini.
- Cyaneoderes Ashmead, 1899a:70. Type species: Cyaneoderes fairchildi Ashmead, 1899 = Bombus coeruleus Fabricius, 1804, by original designation. **Xylocopini.**
- Cyanocentris Friese, 1900:244, 251. Type species: Apis versicolor Fabricius, 1775, by designation of Sandhouse, 1943:543. [Centris]. Centridini.
- Cyathocera Smith, 1875:47. Type species: Cyathocera nodicornis Smith, 1875, monobasic. Nomiinae.
- Cyphanthidium Pasteels, 1969a:57. Type species: Cyphanthidium intermedium Pasteels, 1969, by original designation.

 Anthidiini.
- Cyphepicharis Moure, 1945b:306. Type species: Cyphepicharis borgmeieri Moure, 1945, by original designation. Centridini.
- Cyphomelissa Schrottky, 1902a:493. Type species: Cyphomelissa pernigra Schrottky, 1902 = Melissa diabolica Friese, 1900, by original designation. Ericrocidini.
- Cyphopyga Robertson, 1903a:169, 172. Type species: Megachile montivaga Cresson, 1878, by original designation. Megachilini.
- Cyphoxylocopa Hurd and Moure, 1963:283. Type species: Xylocopa ocularis Pérez, 1901, by original designation. [Xylocopa]. Xylocopini.
- Cyprirophites Warncke, 1979:135. Type species: Dufourea caeruleocephala cypria Mavromoustakis, 1952, by original designation. [Rophites]. Rophitinae.
- Cyrtapis Cockerell, 1908c:339. Type species: Cyrtapis anomalus Cockerell, 1908, monobasic. Fossil.
- Cyrtocoelioxys Mitchell, 1973:106. Type species: Coelioxys costaricensis Cockerell, 1914, by original designation. [Coelioxys]. Megachilini.
- Cyrtopasites Mavromoustakis, 1963d:753. Type species: Schmiedeknechtia verhoeffi Mavromoustakis, 1959, by original designation. [Schmiedeknechtia]. Ammobatoidini.

- Cyrtosmia Michener, 1947:292, Type species: Osmia hypocrita Cockerell, 1906, by original designation. [Hoplitis]. Osmiini.
- Dactylandrena Viereck, 1924:20. Type species: Andrena maura Viereck, 1924 = Andrena caliginosa Viereck, 1916, by original designation. [Andrena]. Andreninae.
- Dactylomegachile Mitchell, 1943:670. Type species: Megachile parsonsiae Schrottky, 1914, by original designation. [Megachile]. Megachilini.
- Dactylurina Cockerell, 1934b:47. Type species: Trigona staudingeri Gribodo, 1893, by original designation. Meliponini.
- Dalloapula Michener, 1975:246. Type species: Allodape dichroa Strand, 1915, by original designation. [Allodapula]. Allodapini.
- Dasiapis Cockerell, 1903c:450. Type species: Dasiapis ochracea Cockerell, 1903, monobasic. **Emphorini.**
- Dasyandrena LaBerge, 1977:71. Type species: Andrena obscuripostica Viereck, 1916, by original designation. [Andrena]. Andreninae.
- Dasybombus Labougle and Ayala, 1985:49. Type species: Bombus macgregori Labougle and Ayala, 1985, by original designation. [Bombus]. Bombini.
- Dasycoelioxys Mitchell, 1973:99. Type species: Coelioxys pergandei Schletterer, 1890, by original designation. [Coelioxys]. Megachilini.
- Dasycolletes Smith, 1853:14. Type species: Dasycolletes metallicus Smith, 1853, by designation of Cockerell, 1905a:347. Colletinae.
- Dasyglossa Illiger, 1807, in Klug, 1807b:217 footnote, no valid species names; Klug, 1810:44, included valid species. Type species: Oxaea flavescens Klug, by designation of Sandhouse, 1943:544. Isotypic with Oxaea. Oxaeinae.
- Dasyhalonia Michener. LaBerge, and Moure, 1955:226. Type species: *Tetralonia spiniventris* Friese, 1910 = *Tetralonia mimetica* Brèthes, 1910, by original designation. **Eucerini.**
- Dasyhesma Michener, 1965a:102. Type species: Dasyhesma robusta Michener, 1965, by original designation. Euryglossinae.
- Dasymegachile Mitchell, 1943:669. Type species: Megachile saulcyi Guérin, 1845, by original designation. [Megachile]. Megachilini.
- Dasymegilla Brooks, 1988:486. Type species: Apis quadrimaculata Panzer, 1798, by original designation. [Anthophora]. Isotypic with Lasius Jurine. Anthophorini.
- Dasyosmia Michener, 1947:294. Type species: Alcidamea biscutellae Cockerell, 1897, by original designation. [Hoplitis]. Osmiini.
- Dasypoda Latreille, 1802a:424. Type species: Andrena hirtipes Fabricius, 1793, designated by Blanchard, 1840:414. Melitta swammerdamiella Kirby, 1802, designated as the type species by Curtis, 1831:367, was not originally included in Dasypoda but is a synonym of Andrena hirtipes Fabricius. Dasypodinae.

- Dasyscirtetica Michener, LaBerge, and Moure, 1955:218. Type species: *Tetralonia gilva* Holmberg, 1884, by original designation. [Alloscirtetica]. Eucerini.
- Dasystilbe Dressler, 1978:193. Type species: Euglossa villosa Moure, 1968, by original designation. [Euglossa]. Euglossini.
- Dasyxylocopa Hurd and Moure, 1963:113. Type species: Xylocopa bimaculata Friese, 1903, by original designation. [Xylocopa]. Xylocopini.
- Delomegachile Viereck, 1916:745. Type species: Megachile vidua Smith, 1853 = M. latimanus Say, 1823, monobasic. [Megachile]. Isotypic with Xanthosarus by synonymy. Megachilini.
- Deltoptila LaBerge and Michener, 1963:211. Type species: Habropoda montezumia Smith, 1879, by original designation. Anthophorini.
- Denticolletes Noskiewicz, 1936:25, 486. Type species: Colletes graeffei Alfken, 1900, monobasic. [Colletes]. Colletinae.
- Dentigera Méhelÿ, 1935:45, 151. Invalid because no type species was designated. [Prosopis]. **Hylaeinae**.
- Dentigera Popov, 1939:168. Type species: Hylaeus brevicornis Nylander, 1852, by original designation. [Prosopis]. Hylaeinae.
- Dentirophites Warncke, 1979:130. Type species: Dufourea gaullei Vachal, 1897, by original designation. [Rophites]. **Rophitinae.**
- Deranchanthidium Griswold and Michener, 1988:34. Type species: Dianthidium chamela Griswold and Michener, 1988, by original designation. [Dianthidium]. Anthidiini.
- Deranchylaeus Bridwell, 1919:136. Type species: *Prosopis* curvicarinata Cameron, 1905, by original designation. [Hylaeus]. **Hylaeinae**.
- Derandrena Ribble, 1968a:333. Type species: Andrena vandykei Cockerell, 1936, by original designation. [Andrena]. Andreninae.
- Dermatohesma Michener, 1965a:91. Type species: Euryglossimorpha abnormis Rayment, 1935, by original designation. [Euryglossa]. Euryglossinae.
- Derotropis Mitchell, 1936:156. Type species: Megachile pascoensis Mitchell, 1934, by original designation. [Megachile]. Megachilini.
- Desmotetrapedia Schrottky, 1909d:223. Type species: Tetrapedia muelleri Friese, 1899, by original designation. Isotypic with Chalepogenus by synonymy. Tapinotaspidini.
- Diadasia Patton, 1879a:475. Type species: Melissodes enavata Cresson, 1872, by original designation. Emphorini.
- Diadasiana Michener, 1954:130, incorrect subsequent spelling of Diadasina Moure, 1950. Emphorini.
- Diadasiella Ashmead, 1899a:64. Type species: Diadasiella coquilletti Ashmead, 1899 = Synhalonia albicans Provancher, 1896, by original designation. Exomalopsini.
- Diadasina Moure, 1950c;392. Type species: Melitoma paraensis Ducke, 1912, by original designation. Emphorini.

- Diagonozus Enderlein, 1903:35. Type species: Diagonozus bicometes Enderlein, 1903, monobasic. Halictini.
- *Dialictus* Robertson, 1902d:48. Type species: *Halictus anomalus* Robertson, 1892, by original designation. **Halictinae.**
- Dialonia Robertson, 1903b:104. Type species: Sphecodes antennariae Robertson, 1891, by original designation. Halictini.
- Diandrena Cockerell, 1903a:75. Type species: Panurgus chalybaeus Cresson, 1878, by original designation.

 Andreninae.
- Dianthidium Cockerell, 1900b:412. Type species: Anthidium curvatum Smith, 1854, by original designation. [Anthidium]. Anthidiini.
- Diaxylocopa Hurd and Moure, 1963:129. Type species: Xylocopa truxali Hurd and Moure, 1963, by original designation. [Xylocopa]. Xylocopini.
- Diceratosmia Robertson, 1903a:166, 171. Type species: Osmia 4-dentata Cresson, 1878 = Osmia conjuncta Cresson, 1864, by original designation. Osmiini.
- Dichanthidium Moure, 1947a:30 (January); also described as new by Moure, 1947b:235 (June). Type species: Dichanthidium exile Moure, 1947, by original designation. Anthidiini.
- Dichroa Illiger, 1806:46. Type species: Sphex gibba Linnaeus, 1758, by designation of Sandhouse, 1943:545. Isotypic with Sphecodes. Halictini.
- Dicranthidium Moure and Urban, 1975:837. Type species: Anthidium arenarium Ducke, 1907, by original designation. Anthidiini.
- Dicromonia Michener and Brooks, 1987:100. Type species: Agenmonia wenzeli Michener and Brooks, 1987, by original designation. [Agenmonia]. Meganomiinae.
- Dictyohalictus Michener, 1978a:518. Type species: Halictus retigerus Cockerell, 1940, by original designation. [Pachyhalictus]. Isotypic with Rugalictus by synonymy. Halictini.
- Didonia Gribodo, 1894:106. Type species: Didonia punica Gribodo, 1894 = Andrena mucida Kriechbaumer, 1873, monobasic. Andreninae.
- Diepeolus Gribodo, 1894:79. Type species: Epeolus giannellii Gribodo, 1894, monobasic. [Epeolus]. Epeolini.
- Dieunomia Cockerell, 1899a:14, replacement for Eunomia Cresson, 1875. Type species: Eunomia marginipennis Cresson, 1875 = Nomia kirbii Smith, 1865, autobasic and by designation of Cockerell, 1910f:290. Nominae.
- Digitella Pasteels, 1965:191. Type species: Megachile digiticauda Cockerell, 1937, by original designation. [Megachile]. Megachilini.
- Digressobombus Laverty, Plowright, and Williams, 1984:1051. Type species: *Megabombus digressus* Milliron, 1962, by original designation. [Bombus]. **Bombini.**
- Digronoceras Cockerell, 1931c:134. Type species: Megachile combusta Smith, 1853 = Apis cincta Fabricius, 1771, by original designation. [Gronoceras]. Megachilini.

- Dilobopeltis Fairmaire, 1858:266. Type species: Dilobopeltis fuscipennis Fairmaire, 1858 = Thynnus abdominalis Fabricius, 1793, monobasic. Isotypic with Euaspis by synonymy. Anthidiini.
- Dinagapostemon Moure and Hurd, 1982:46. Type species: Halictus sicheli Vachal, 1901, by original designation. Halictini.
- Dinavis Pasteels, 1965:549. Type species: Megachile muansae Friese, 1911, by original designation. [Chalicodoma]. Megachilini.
- Dinomia Hirashima, 1956:29. Type species: Nomia taiwana Hirashima, 1956, by original designation. [Nomia]. Nomiinae.
- Dinoxylocopa Hurd and Moure, 1963:230. Type species: *Xylocopa absurdipes* Enderlein, 1903 = *Xylocopa io* Vachal, 1898, by original designation. [Xylocopa]. **Xylocopini.**
- Diomalopsis Michener and Moure, 1957:431. Type species: Exomalopsis bicellularis Michener and Moure, 1957, by original designation. [Exomalopsis]. Exomalopsini.
- Dioxoides Popov. 1947:89. Type species: Coelioxys tridentata Nylander, 1848, by original designation. **Dioxyini.**
- Dioxys Lepeletier and Serville, 1825:109. Type species: *Trachusa cincta* Jurine, 1807, monobasic. **Dioxyini.**
- Dipedia Friese, 1906d:92. Type species: Ancyloscelis armatus Smith, 1854, by designation of Lutz and Cockerell, 1920:592. Emphorini.
- Diphaglossa Spinola, 1851:168. Type species: Diphaglossa gayi Spinola, 1851, monobasic. Diphaglossinae.
- Diphysis Lepeletier, 1841:307. Type species: Diphysis pyrenaica Lepeletier, 1841 = Apis byssina Panzer, 1798, monobasic. Isotypic with *Trachusa* Panzer and *Megachileoides* by synonymy. **Anthidiini.**
- Disparapis Stage, 1981, in Michener, 1981:96. Type species: Hesperapis arenicola Crawford, 1917, by original designation. [Hesperapis]. Dasypodinae.
- Dissoglotta Moure, 1945a:144. Type species: Dissoglotta stenoceratina Moure, 1945, by original designation. Dissoglottini.
- Distandrena Warncke, 1968:60. Type species: Andrena longibarbis Pérez, 1895, by original designation. [Andrena]. Andreninae.
- Dithygater Moure and Michener, 1955b:309. Type species: Dithygater seabrai Moure and Michener, 1955, by original designation. Eucerini.
- Diversibombus Skorikov, 1938b:1, unjustified emendation of Diversobombus Skorikov, 1914. Bombini.
- Diversobombus Skorikov, 1914b:406. Type species: Bombus diversus Smith, 1869, by designation of Sandhouse, 1943:546. [Bombus]. Bombini.
- Dizonamegilla Brooks, 1988:505. Type species: Megilla sesquicincta Erichson and Klug, 1842, by original designation. [Amegilla]. Anthophorini.
- Doeringiella Holmberg, 1886a:151; 1886b:233. Type species: Doeringiella bizonata Holmberg, 1886, monobasic. Epeolini.

- Dolichochile Viereck, 1909:49. Type species: Dolichochile melittoides Viereck, 1909, by original designation. Melittinae.
- Dolichostelis Parker and Bohart, 1979:138. Type species: Stelis laticincta Cresson, 1878, by original designation. Anthidiini.
- Dolichotrigona Moure, 1950a:248. Type species: Trigona longitarsis Ducke, 1916, by original designation. [Hypotrigona]. Meliponini.
- Domanthidium Pasteels, 1969a:95. Type species: Anthidium abdominale Friese, 1904, by original designation. Anthidiini.
- Doxanthidium Pasteels, 1969a:28. Type species: Anthidium paradoxum Mocsáry, 1884, by original designation. Anthidiini.
- Drepanium Robertson, 1903b:103. Type species: Sphecodes falcifer Patton, 1880 = Sphecodes confertus Say, 1837, by original designation. Halictini.
- Duckeanthidium Moure and Hurd, 1960:2. Type species: Anthidium megachiliforme Ducke, 1907, by original designation. Anthidiini.
- Duckeola Moure, 1944a:71. Type species: *Trigona huberi* Friese, 1901 = *Trigona ghilianii* Spinola, 1853, by original designation. **Meliponini**.
- Dufourea Lepeletier, 1841;227. Type species: Dufourea minuta Lepeletier, 1841, by designation of Richards, 1935:172 and Timberlake, 1939:396. D. vulgaris Schenck, 1859, was not designated by Cockerell, 1924c:244, as stated by Sandhouse (1943:547), and was not originally included. Rophitinae.
- Ebmeria Pesenko, 1986a:136. Type species: Halictus costulatus Kriechbaumer, 1873, by original designation. [Lasioglossum]. Halictini.
- Ebmeriana Pagliano and Scaramozzino, 1990:127, replacement for *Micropasites* Warncke, 1983. Type species: *Ammobates minutissimus* Mavromoustakis, autobasic. [Pasites]. **Ammobatini.**
- Ecclitodes Roig-Alsina, 1989:9. Type species: Epeolus stuardi Ruiz, 1935, by original designation. Osirini.
- Echinanthidium Pasteels, 1969a:101. Type species: Anthidium echinatum Klug, 1832, by original designation. [Anthidium]. Anthidiini.
- Echthralictus Perkins and Cheesman, 1928:14. Type species: Halictus extraordinarius Kohl, 1908, by original designation. Halictini.
- Ecplectica Holmberg, 1884:123. Type species: Ecplectica tintinnans Holmberg, 1884, monobasic. Eucerini.
- Edriohylaeus Michener, 1965a:124. Type species: Hylaeus ofarrelli Michener, 1965, by original designation. [Hylaeus]. Hylaeinae.
- Edwynia Moure, 1951c:195, not Aldrich, 1930. Type species: Pasiphae flavicornis Spinola, 1851, by original designation. See Edwyniana. Colletinae.
- Edwyniana Moure, 1954a:165, replacement for Edwynia Moure, 1951. Type species: Pasiphae flavicornis Spinola, 1851, autobasic. Colletinae.

- Effactapis Michener. 1977:6. Type species: Effactapis furax Michener, 1977, by original designation. Allodapini.
- Egapista Cockerell, 1904a:357, replacement for Apista Smith, 1861. Type species: Apista opalina Smith, 1861, autobasic. Dissoglottini.
- Eickwortapis Michener and Poinar, 1997:354. Type species: Eickwortapis dominicana Michener and Poinar, 1997. by original designation. Fossil. Halictinae.
- Elandrena Lanham, 1949:203. Type species: Andrena amplificata Cockerell, 1910, by original designation. [Andrena]. Andreninae.
- Elaphropoda Lieftinck, 1966:148. Type species: Habropoda impatiens Lieftinck, 1944, by original designation. Anthophorini.
- Elecolletes Warncke, 1978:330. Type species: Colletes elegans Noskiewicz, 1936, by original designation. [Colletes]. Colletinae.
- Electrapis Cockerell, 1908d:326; also described as new by Cockerell, 1909e:7. Type species: Apis meliponoides Buttel-Reepen, 1906, designated by Cockerell, 1909e:8. Fossil.
- Emphor Patton, 1879a:476. Type species: Melissodes bombiformis Cresson, 1878, by original designation. Emphorini.
- Emphoropsis Ashmead, 1899a:60, no included species; Cockerell and Cockerell, 1901:48, included species. Type species: Anthophora floridana Smith, 1854 = Bombus laboriosus Fabricius, 1804, by designation of Cockerell and Cockerell, 1901:48. Anthophorini.
- Energoponus Holmberg, 1903:406. Type species: Energoponus strenuus Holmberg, 1903 = Ptilothrix plumatus Smith, 1853, by designation of Sandhouse, 1943:547. Isotypic with Ptilothrix by synonymy. Emphorini.
- Ensliniana Alfken, 1938:431. Type species: Ensliniana cuspidata Alfken, 1938 = Stelis bidentata Friese, 1899, by original designation. **Dioxyini.**
- Entechnia Patton, 1879a:476. Type species: Anthophora taurea Say, 1837, by original designation. **Emphorini.**
- Eoanthidiellum Pasteels, 1969a:51. Type species: Anthidium elongatum Friese, 1897 = Anthidium clypeare Morawitz, 1873, by original designation. [Eoanthidium]. Anthidiini.
- Eoanthidium Popov, 1950a:316. Type species: Anthidium insulare Morawitz, 1873, by original designation. [Dianthidium]. Anthidiini.
- Eomelipona Moure, 1992:35. Type species: Melipona marginata Lepeletier, 1836, by original designation. [Melipona]. Meliponini.
- Eopeponapis Hurd and Linsley, 1970:20. Type species: Xenoglossa utahensis Cockerell, 1905, by original designation. [Peponapis]. Eucerini.
- Eopsithyrus Popov, 1931a:134. Type species: Apathus tibetanus Morawitz, 1886, by original designation. [Psithyrus]. Bombini.

- Eothrincostoma Blüthgen, 1930:496, 501. Type species: *Halictus torridus* Smith, 1879, by designation of Sandhouse. 1943:548. **Halictini.**
- Eoxenoglossa Hurd and Linsley, 1970:34. Type species: *Melissodes strenua* Cresson, 1878, by original designation. [Xenoglossa]. Eucerini.
- Eoxylocopa Sakagami and Yoshikawa, 1961:413, nomen nudum. [Xylocopa]. **Xylocopini.**
- Epanthidium Moure, 1947a:33. Type species: Hypanthidium tigrinum Schrottky. 1905, by original designation. Anthidiini.
- Epeicharis Radoszkowski, 1884:18. Type species: Epeicharis mexicanus Radoszkowski, 1884. monobasic. See Fiorentinia. Tapinotaspidini.
- Epeoloides Giraud, 1863:44. Type species: Epeoloides ambiguus Giraud. 1863 = Apis coecutiens Fabricius, 1775, monobasic. Osirini.
- Epeolus Latreille, 1802a:427. Type species: Apis variegata Linnaeus, 1758, monobasic. Isotypic with Monoepeolus. Epeolini.
- *Epicharana* Michener, 1954:144. Type species: *Apis rustica* Olivier, 1789, by original designation. [Epicharis]. **Centridini**.
- Epicharis Klug, 1807. in Illiger, 1807:197, nomen nudum. Centridini.
- Epicharis Klug, 1807b:226. Type species: Centris umbraculata Fabricius, 1804, by designation of Lutz and Cockerell, 1920:562. Latreille (1810) listed Apis hirtipes Fabricius, 1793 as the type species. This was not an originally included species but is a subjective synonym of Apis rustica Olivier, 1789, as is Centris dasypoda Klug, 1807, which was originally included. Moure (1945b, 1960) considered the type to be Apis rustica Olivier, the type species of Epicharana, because Latreille listed a synonym of rustica as the type species of Epicharis, but the Code, 3rd ed., Art. 69(a)(v), makes clear that this reasoning applies only if the author concerned (Latreille) indicated the synonymy, which he did not. Snelling (1984:59) correctly explained the situation. Centridini.
- Epicharitides Moure, 1945b:311. Type species: Epicharis cockerelli Friese, 1900, by original designation. Centridini.
- Epicharoides Radoszkowski, 1884:20. Type species: Epicharoides bipunctatus Radoszkowski, 1884 = Epicharis maculatus Smith, 1874, monobasic. Centridini.
- Epiclopus Spinola, 1851:183. Type species: Epiclopus gayi Spinola, 1851, monobasic. Ericrocidini.
- Epicolpus Ashmead, 1899a:61, lapsus for Epiclopus Spinola, 1851. Ericrocidini.
- Epihalictoides Cockerell and Porter, 1899:420. Type species: Panurgus marginatus Cresson, 1878, monobasic. [Halictoides]. Rophitinae.
- *Epimacrotera* Timberlake, 1954:377. Type species: *Perdita ainsliei* Crawford, 1932, by original designation. [Perdita]. **Panurginae.**
- *Epimelissodes* Ashmead. 1899a:63. Type species: *Melissodes atripes* Cresson, 1872, by original designation. Eucerini.

- *Epimethea* Morawitz, 1876:61. Type species: *Epimethea variegata* Morawitz, 1876, by designation of Cockerell, 1922c:1. **Panurginae.**
- Epimonispractor Holmberg, 1887b:225, nomen nudum. Exomalopsini.
- Epimonispractor Holmberg, 1903:426. Type species: Epimonispractor gratiosus Holmberg, 1903 = Exomalopsis analis Spinola, 1853, by designation of Sandhouse, 1943:548. Sandhouse erroneously reported original designation. Exomalopsini.
- Epinomia Ashmead, 1899a:88. Type species: Nomia persimilis Cockerell. 1898 = Nomia triangulifera Vachal, 1897, by original designation. Nomiinae.
- Epinomia Alfken, 1939:113. not Ashmead, 1899. Type species: Nomia andrenoides Vachal, 1903 = Nomia andrei Vachal, 1897, by original designation. [Nomia]. See Alfkenomia. Nomiinae.
- Epixylocopa Hurd and Moure, 1963:223. Type species: *Xylocopa rufitarsis* Lepeletier. 1841, by original designation. [Xylocopa]. **Xylocopini.**
- Erandrena LaBerge, 1986:505. Type species: Andrena principalis LaBerge, 1986, by original designation. [Andrena]. Andreninae.
- Eremandrena LaBerge, 1964:295. Type species: Pterandrena pallidiscopa Viereck, 1904. by original designation. [Andrena]. Andreninae.
- Eremaphanta Popov, 1940:53. Type species: Rhophites vitellinus Morawitz. 1876, by original designation. Dasypodinae.
- Eremapis Ogloblin, 1956:149. Type species: Eremapis parvula Ogloblin, 1956, by original designation. Exomalopsini.
- Eremopasites Linsley, 1942:131. Type species: Townsendiella californica Michener, 1936, by original designation. [Townsendiella]. Townsendiellini.
- Eremoplosmia Zanden, 1991:164. Type species: Osmia eremoplana Mavromoustakis, 1949, by original designation. [Anthocopa]. Osmiini.
- Eremosmia Michener, 1943:66. Type species: Osmia robustula Cockerell, 1935, by original designation. [Anthocopa]. Osmiini.
- *Eriades* Dalla Torre and Friese, 1895:69, unjustified emendation of *Heriades* Spinola, 1808. **Osmiini.**
- Ericrocis Cresson, 1887:131, 134. Type species: Crocisa? lata Cresson, 1878, monobasic. Ericrocidini.
- Eriops Klug. 1807, *in* Illiger, 1807:197; Klug, 1807b:207, 227. Type species: *Andrena lobata* Panzer, 1799 = *Apis calcarata* Scopoli, 1763, monobasic. Isotypic with *Panurgus* by synonymy. **Panurginae.**
- *Eryops* Latreille, 1811:716, unjustified emendation of *Eriops* Klug, 1807. **Panurginae.**
- Erythrandrena Zavortink, 1972:61. Type species: Megandrena mentzeliae Zavortink, 1972, by original designation. [Megandrena]. Andreninae.

- Erythronomioides Pesenko, 1983:176. Type species: Nomioides socotranus Blüthgen, 1925, by original designation. [Nomioides]. Nomioidinae.
- Erythrosmia Schmiedeknecht, 1885:20. Type species: Osmia andrenoides Spinola, 1808, by designation of Cockerell, 1922a:6. [Osmia]. Osmiini.
- Ethalonchopria Michener, 1989:670. Type species: Apista gaullei Vachal, 1909, by original designation. [Eulonchopria]. Colletinae.
- Euandrena Hedicke, 1933:213. Type species: Andrena bicolor Fabricius, 1775, by original designation. [Andrena]. Andreninae.
- Euaspis Gerstaecker, 1857:460. Type species: Thynnus abdominalis Fabricius, 1793, by original designation. Isotypic with Dilobopeltis by synonymy. Anthidiini.
- Eucara Friese, 1905b:241. Type species: Anthophora laticeps Friese, 1905, by designation of Cockerell, 1933a:465. [Anthophora]. Eucerini.
- *Eucera* Scopoli, 1770:8. Type species: *Apis longicornis* Linnaeus, 1758, by designation of Latreille, 1810:439. **Eucerini.**
- Euceratina Hirashima, Moure, and Daly, 1971, in Hirashima, 1971a:369. Type species: Apis callosa Fabricius, 1794, by original designation. [Ceratina]. Ceratinini.
- Eucerinoda Michener and Moure, 1957:445. Type species: Anthophora gayi Spinola, 1851, by original designation. Eucerini.
- Euchalicodoma Tkalců, 1969:358. Type species: Megachile asiatica Morawitz, 1875, by original designation. [Chalicodoma], Isotypic with Allomegachile, Megachilini.
- Eucharis Dalla Torre, 1896:300. Listed as a junior synonym of Epicharis and Eucharis hirtipes listed in synonymy on p. 301, and both attributed to Lepeletier [and Serville], 1825 (correctly 1828):794 and 795. Search of these and other pages of that work reveals no use of Eucharis, which therefore appears to be an error by Dalla Torre, and not available according to the Code, 3rd ed., Art. 11(c). Centridini.
- Eucondylops Brauns, 1902:377. Type species: Eucondylops konowi Brauns, 1902, monobasic. Allodapini.
- Eudioxys Mavromoustakis, 1963c:443. Type species: Dioxys quadrispinosa Friese, 1899, by original designation. Dioxyini.
- Euflorilegus Ogloblin, 1955:231. Type species: Florilegus riparius Ogloblin, 1955, by original designation. [Florilegus]. Eucerini.
- Eufriesea Cockerell 1908a:41, replacement for Eumorpha Friese, 1899. Type species: Euglossa pulchra Smith, 1854, autobasic. Euglossini.
- Eufriesia Lutz and Cockerell, 1920:544, unjustified emendation of Eufriesea Cockerell, 1908. Euglossini.
- Euglages Gerstaecker, 1869:149. Type species: Euglages scripta Gerstaecker, 1869, monobasic. Ammobatoidini.
- Euglossa Latreille, 1802a:436. Type species: Apis cordata Linnaeus, 1758, by designation of Blanchard, 1849:pl. 129 (1847). Euglossini.

- Euglossella Moure 1967a:401, replacement for Cnemidium Perty, 1833. Type species: Cnemidium viride Perty, 1833, autobasic. [Euglossa]. Euglossini.
- Euherbstia Friese, 1925a;8. Type species: Euherbstia excellens Friese, 1925, monobasic. Andreninae.
- Euhesma Michener, 1965a:88. Type species: Euryglossa wahlenbergiae Michener, 1965, by original designation. [Euryglossa]. Euryglossinae.
- Eulaema Lepeletier, 1841:11. Type species: Apis dimidiata Fabricius, 1793 = Apis meriana Olivier, 1789, by designation of Taschenberg, 1883:85. **Euglossini.**
- Eulaenia Spinola, 1851:167, incorrect subsequent spelling of Eulaema Lepeletier, 1841. Euglossini.
- Eulema Smith, 1854:380, unjustified emendation of Eulaema Lepeletier, 1841. Euglossini.
- Eulonchopria Brèthes, 1909a:247. Type species: Eulonchopria psaenythioides Brèthes, 1909, monobasic. Colletinae.
- Eumegachilana Michener, 1965a:191. Type species: Megachile clotho Smith, 1861, by original designation. [Chalicodoma]. Megachilini.
- Eumegachile Friese, 1898b:198, no included species; Friese, 1899c:36, included species. Type species: Megachile bombycina Radoszkowski, 1874, by designation of Cockerell, 1930c:209. Megachilini.
- Eumelissa Snelling and Brooks, 1985:21. Type species: Melissa decorata Smith, 1854, by original designation. [Mesoplia]. Ericrocidini.
- Eumelissodes LaBerge, 1956:1177. Type species: Melissodes agilis Cresson, 1878, by original designation. [Melissodes]. Eucerini.
- Eumorpha Friese 1899b: 126, not Hübner, 1807. Type species: Euglossa pulchra Smith, 1854, by designation of Cockerell, 1908a: 41 footnote. See Eufriesea. Euglossini.
- Eunomia Cresson, 1875:723, not Hübner, 1818. Type species: Eunomia marginipennis Cresson, 1875 = Nomia kirbii Smith, 1865, by designation of Cockerell, 1910f:290. See Dieunomia. Nomiinae.
- Eunomioides Blüthgen, 1937:3, nomen nudum, = Ceylalictus. Type species: Andrena variegata Olivier, 1789, by original designation. [Nomioides]. Nomioidinae.
- Eupalaeorhiza Meade-Waldo, 1914b:403. Type species: Eupalaeorhiza papuana Meade-Waldo, 1914, by original designation. **Hylaeinae.**
- Eupavlovskia Popov, 1955c:330. Type species: Melecta funeraria Smith, 1854, by original designation. Melectini.
- Eupetersia Blüthgen, 1928a:49. Type species: Eupetersia neavei Blüthgen, 1928, by original designation. Also published as new by Blüthgen, 1928b:165. Halictini.
- Euphileremus Popov, 1951:906. Type species: Phileremus oraniensis Lepeletier, 1841, by original designation. [Ammobates]. Ammobatini.
- Euplusia Moure 1943a:189, replacement for *Plusia* Hoffmannsegg, 1817. Type species: *Plusia superba* Hoffmannsegg, 1817, autobasic. **Euglossini.**

- Euprosopellus Michener, 1965a:132. Type species: Prosopis dromedaria Cockerell, 1910, by original designation. [Hylaeus]. Hylaeinae.
- Euprosopis Perkins, 1912:106. Type species: Prosopis lusela Cockerell, 1910, by original designation. Hylaeinae.
- Euprosopoides Michener, 1965a:131. Type species: *Prosopis fulvicornis* Smith, 1853 = *Prosopis ruficeps* Smith, 1853, by original designation. [Hylaeus]. **Hylaeinae.**
- *Euryapis* Sandhouse, 1943:551, replacement for *Orbitella* Ma, 1938. Type species: *Xylocopa confusa* Pérez, 1901, autobasic and original designation. **Xylocopini**.
- Euryglossa Smith, 1853:17. Type species: Euryglossa cupreochalybea Smith, 1853. by designation of Meade-Waldo, 1923:6. Euryglossinae.
- Euryglossella Cockerell, 1910c:263. Type species: Euryglossella minima Cockerell, 1910, monobasic. Euryglossinae.
- Euryglossidia Cockerell, 1910b:358. Type species: Euryglossidia rectangulata Cockerell, 1910, by original designation. Colletinae.
- Euryglossimorpha Strand, 1910:40. Type species: Euryglossa nigra Smith, 1879, monobasic. [Euryglossa]. Euryglossinae.
- Euryglossina Cockerell, 1910a;211. Type species: Euryglossa semipurpurea Cockerell, 1910, monobasic. [Euryglossa]. Euryglossinae.
- Euryglossula Michener, 1965a:111. Type species: Euryglossina chalcosoma Cockerell, 1913, by original designation. Euryglossinae.
- Eurymella Pasteels, 1965:64. Type species: Megachile eurymera Smith, 1854, by original designation. [Megachile]. Megachilini.
- Eurypariella Tkalců, 1995:111. Type species: Osmia denudata Morawitz, 1880, by original designation. Osmiini.
- Eurytis Smith, 1854:279. Type species: Eurytis funereus Smith, 1854, monobasic. Erierocidini.
- Eusphecogastra Hirashima, 1992:395, replacement for Sphecogaster Hirashima, 1978. Type species: Palaeorhiza paradisea Hirashima, 1978, autobasic and by original designation. Hylaeinae.
- Eusynhalonia Ashmead, 1899a:63. Type species: Melissodes edwardsii Cresson, 1878, by original designation. Eucerini.
- Eutechnia Holmberg, 1903:400, lapsus for Entechnia Patton, 1879. Emphorini.
- Euthosmia Sinha, 1958:235. Type species: Heriades glaucum Fowler, 1899, by original designation. [Osmia]. Osmiini.
- Euthyglossa Radoszkowski, 1884:21. Type species: Euthyglossa fasciata Radoszkowski, 1884 = Eucera euthyglossa Dalla Torre, 1896, monobasic. Osirini.
- Entricharaea Thomson, 1872:228. Type species: Apis argentata Fabricius, 1793, monobasic. [Megachile]. Isotypic with Paramegachile. Megachilini.
- Eutrypetes Popov, 1955a:280. Type species: Heriades turcomanica Popov, 1955, by original designation. [Heriades]. Osmiini.

- Euxylocopa Hurd and Moure, 1963:234. Type species: *Xylocopa fraudulenta* Gribodo, 1894 = *Xylocopa erythrina* Gribodo, 1894, by original designation. [Xylocopa]. Isotypic with *Perixylocopa* by synonymy. **Xylocopini.**
- Eversmannibombus Skorikov, 1938a:145. Type species: Mucidobombus eversmanniellus Skorikov, 1922 = Bombus eversmanni Friese, 1911 (not B. modestus eversmanni Skorikov, 1910) = Bombus persicus Radoszkowski, 1881, by designation of Richards, 1968:214. [Agribombus]. Bombini
- Evodia Panzer, 1806:207. Type species: Apis calendarum Panzer, 1802 = Apis succincta Linnaeus, 1758, monobasic. Isotypic with Colletes by synonymy. Colletinae.
- Evylaeus Robertson, 1902c:247. Type species: Halictus arcuatus Robertson, 1893, by original designation. Halictini.
- Exaerete Hoffmannsegg, 1817:53. Type species: Apis dentata Linnaeus, 1758, monobasic. Isotypic with Caliendra and Chrysantheda by synonymy. Euglossini.
- Exallocentris Snelling, 1974:35. Type species: Centris anomala Snelling, 1966, by original designation. [Centris]. Centridini.
- Exanthidium Pasteels, 1969a:82. Type species: Anthidium eximium Giraud, 1863, by original designation. Anthidiini.
- Exanthocopa Tkalců, 1993a:55. Type species: Osmia oxypyga Benoist, 1927, by original designation. [Anthocopa]. Osmiini.
- Excolletes Michener, 1965a:56. Type species: Leioproctus impatellatus Michener, 1965, by original designation. [Leioproctus]. Colletinae.
- Exilohombus Skorikov, 1922b:150. Type species: Mucidohombus exil [misprinted exiln] Skorikov, 1922, monobasic. [Mucidohombus]. Bombini.
- Exomalopsis Spinola, 1853:89. Type species: Exomalopsis fulvopilosa Spinola, 1853 = Exomalopsis auropilosa Spinola, 1853, by designation of Taschenberg, 1883:82. Exomalopsini.
- Exoneura Smith, 1854;232. Type species: Exoneura bicolor Smith, 1854, monobasic. Allodapini.
- Exoneurella Michener, 1963:257. Type species: Exoneura lawsoni Rayment, 1946, by original designation. Allodapini.
- Exoneuridia Cockerell, 1911d:232. Type species: Exoneura libanensis Friese, 1899, by original designation. [Exoneura]. Allodapini.
- Exoneurula Michener, 1966b:573. Type species: Exoneurula zavattarii Michener, 1966 = Compsomelissa borneri Alfken, 1924. by original designation. Isotypic with Compsomelissa by synonymy. Allodapini.
- Exosmia Tkalců, 1979:321. Type species: Osmia difficilis Morawitz, 1875, by original designation. [Osmia]. Osmiini.
- Fahrhalictus Warncke, 1975b;95. Type species: Halictus fahringeri Friese, 1921, by original designation. [Halictus]. Halictini.
- Fasciata Méhelÿ, 1935:44, 150. Type species: Prosopis facialis Pérez, 1895 = Prosopis trinotata Pérez, 1895, monobasic. [Prosopis]. **Hylaeinae**.
- Fascista Popov, 1939:168, incorrect subsequent spelling for Fasciata Méhelÿ, 1935.

- Fernaldaepsithyrus Frison, 1927:70. Type species: Psithyrus fernaldae Franklin, 1911, monobasic. [Psithyrus]. Bombini.
- Fertonella Cockerell, 1920a:257, replacement for Perezia Ferton, 1914. Type species: Perezia maura Ferton, 1914 = Megachile leachella Curtis, 1828, autobasic and original designation. Megachilini.
- Fervidobombus Skorikov, 1922b:123, 153. Type species: Apis fervida Fabricius, 1798, by designation of Frison, 1927:69. **Bombini.**
- Festivobombus Tkalců, 1972:27. Type species: Bombus festivus Smith, 1861, by original designation. [Pyrobombus]. Bombini.
- *Fidelia* Friese, 1899a:244. Type species: *Fidelia paradoxa* Friese, 1899, monobasic. **Fideliini.**
- Filiglossa Rayment, 1959a:324. Type species: Filiglossa filamentosa Rayment, 1959, by original designation. Colletinae.
- Fiorentinia Dalla Torre, 1896:334, replacement for Epeicharis Radoszkowski, 1884, not Epicharis Klug. Type species: Epeicharis mexicanus Radoszkowski, 1884, autobasic. Tapinotaspidini.
- Flavipanurgus Warncke, 1972:69. Type species: Panurgus flavus Friese, 1897, by original designation. [Panurgus]. Panurginae.
- Flavodufourea Ebmer, 1984:373. Type species: Dufourea flavicornis Friese, 1913, by original designation. [Dufourea]. **Rophitinae.**
- Flavomeliturgula Warncke, 1985:229. This name is not valid since no type species or even included species was indicated. From descriptions one can guess that Warncke intended this to be a subgeneric name for *Meliturgula deserta* Warncke. [Meliturgula]. **Panurginae.**
- Florentina Ashmead, 1899a:67, lapsus for Fiorentinia Dalla Torre, 1896. Tapinotaspidini.
- Florilegus Robertson, 1900:53. Type species: Melissodes condigna Cresson, 1879, monobasic. Eucerini.
- Floriraptor Moure and Michener, 1955b:268. Type species: Melissodes atropos Smith, 1879 = Tetralonia melectoides Smith, 1879, by original designation. [Florilegus]. Eucerini.
- Foersterapis Moure, 1964a:441. Type species: Zikanapis foersteri Moure and Seabra, 1962, by original designation. [Zikanapis]. Caupolicanini.
- Formicapis Sladen, 1916a:271. Type species: Formicapis clypeata Sladen, 1916 = Osmia robusta Nylander, 1848, monobasic. Osmiini.
- Foveosmia Warncke, 1991c:267. Type species: Heriades foveolatus Morawitz, 1868, by original designation. [Osmia]. Osmiini.
- Fraternobombus Skorikov, 1922b:156. Type species: Apathus fraternus Smith, 1854, by designation of Frison, 1927:63. [Alpigenobombus]. Bombini.
- Friesea Schrottky, 1902a:418, not Dalla Torre, 1895. Type species: Friesea brasiliensis Schrottky, 1902 = Camptopoeum

- prinii Holmberg, 1884, monobasic. See *Parafriesea*. **Panurginae.**
- Friesella Moure, 1946a:441; 1946b:611. Type species: Melipona schrottkyi Friese, 1900, by original designation. Meliponini.
- Friese 1902, monobasic. Meliponini.
- Fumandrena Warncke, 1974:98, nomen nudum. [Andrena]. Andreninae.
- Fumandrena Warncke, 1975a:57. Type species: Andrena fumida Pérez, 1895, by original designation. [Andrena]. Andreninae.
- Funebribombus Skorikov, 1922b:157. Type species: Bombus funebris Smith, 1854, monobasic. [Alpigenobombus]. Bombini.
- Furcosmia Schmiedeknecht, 1885:22. Type species: Apis papaveris Latreille, 1799, by designation of Cockerell, 1922a:6. [Osmia]. Isotypic with Anthocopa and Phyllotoma. Osmiini.
- Gaesischia Michener, LaBerge, and Moure, 1955:220. Type species: Svastra fulgurans Holmberg, 1903, by original designation. Eucerini.
- Gaesischiana Michener, LaBerge, and Moure, 1955:224. Type species: Gaesischia exul Michener, LaBerge, and Moure, 1955, by original designation. [Gaesischia]. Eucerini.
- Gaesischiopsis Michener, LaBerge, and Moure, 1955:221. Type species: Gaesischia flavoclypeata Michener, LaBerge, and Moure, 1955, by original designation. [Gaesischia]. Eucerini.
- Gaesochira Moure and Michener, 1955b:283. Type species: Gaesochira complanata Moure and Michener, 1955 = Melissodes obscurior Dalla Torre, 1896, by original designation. Eucerini.
- Gastrohalictus Ducke, 1902:102. Type species: Halictus osmioides Ducke, 1902, monobasic. [Halictus]. Halictinae.
- Gastropsis Smith, 1868b:xxxix, replacement for Oestropsis Smith, 1868. Type species: Oestropsis pubescens Smith, 1868, autobasic. Stenotritidae.
- Geandrena LaBerge, 1964:313. Type species: Andrena caerulea Smith, 1879, by original designation. [Andrena]. Andreninae.
- Geissandrena LaBerge and Ribble, 1972:302. Type species: Andrena trevoris Cockerell, 1897, by original designation. [Andrena]. Andreninae.
- Geniotrigona Moure, 1961:212. Type species: Trigona thoracica Smith, 1857, by original designation. Meliponini.
- Genyandrena LaBerge, 1986:544. Type species: Andrena mackieae Cockerell, 1937, by original designation. [Andrena]. Andreninae.
- Geoperdita Cockerell and Porter. 1899:415. Type species: Perdita chamaesarachae Cockerell, 1896, monobasic. [Perdita]. Panurginae.
- Georgealictus Packer, 1993:1656. Type species: Mexalictus polybioides Packer, 1993, by original designation. [Mexalictus]. Halictini.
- Geotrigona Moure, 1943a:146. Type species: *Trigona mombuca* Smith, 1863, by original designation. [Trigona]. **Meliponini.**

- Gephyrohylaeus Michener, 1965a:138. Type species: *Heterapis sandacanensis* Cockerell, 1919, by original designation. **Hylaeinae.**
- Glossadufourea Ebmer, 1993:32. Type species: Dufourea longiglossa Ebmer, 1993, by original designation. Rophitinae.
- Glossalictus Michener, 1965a:173. Type species: Halictus etheridgei Cockerell, 1916, by original designation. [Lasioglossum]. Halictini.
- Glossamegilla Brooks, 1988:512. Type species: Anthophora mesopyrrha Cockerell, 1930, by original designation. [Amegilla]. Anthophorini.
- Glossodialictus Pauly, 1984a:704. Type species: Glossodialictus wittei Pauly, 1984, by original designation. Halictini.
- Glossopasiphae Michener, 1989:643. Type species: Leioproctus plaumanni Michener, 1989, by original designation. [Leioproctus]. Colletinae.
- Glossoperdita Cockerell, 1916c:43. Type species: Glossoperdita pelargoides Cockerell, 1916, monobasic. Pauurginae.
- Glossosmia Michener, 1943:84. Type species: Osmia singularis Morawitz, 1875, by original designation. [Osmia]. Osmiini.
- Glossura Cockerell, 1917b:144. Type species: Euglossa piliventris Guérin-Méneville, 1845, by original designation. [Euglossa]. Euglossini.
- Glossurella Dressler, 1982:131. Type species: Euglossa bursigera Moure, 1970, by original designation. [Euglossa]. Euglossini.
- Glossurocolletes Michener, 1965a:60. Type species: Leioproctus bilobatus Michener, 1965, by original designation. [Leioproctus]. Colletinae.
- Glossuropoda Moure, 1989c:387. Type species: Euglossa intersecta Latreille, 1837, by original designation. [Euglossa].Euglossini.
- Glyphandrena Hedicke, 1933:212. Type species: Apis carbonaria Linnaeus, 1767, by original designation. [Andrena]. Andreninae.
- Glyptapis Cockerell, 1909d:314; also described as new by Cockerell, 1909e:13. Type species: Glyptapis mirabilis Cockerell, 1909, monobasic and designated by Cockerell, 1909e:14. Fossil.
- Glyptobasia Moure, 1941a:98, replacement for Glyptobasis Moure, 1940. Type species: Augochlora chloera Moure, 1940, autobasic. [Augochlora]. Augochlorini.
- Glyptobasis Moure, 1940:48, not M'Lachlan, 1871. Type species: Augochlora chloera Moure, 1940, by original designation. See Glyptobasia. [Augochlora]. Augochlorini.
- Glyptochlora Moure, 1959:188. Type species: Megalopta ornata Smith, 1879, by original designation. [Augochloropsis]. Augochlorini.
- Glyptocoelioxys Mitchell,1973: 92. Type species: Coelioxys vidua Smith 1854, by original designation. [Coelioxys]. Megachilini.

- Gnathanthidium Pasteels, 1969a:92. Type species: Anthidium prionognathum Mavromoustakis, 1935, by original designation. Anthidiini.
- Gnathanthidium Urban, 1994b:337, not Pasteels, 1969. Type species: Gnathanthidium sakagamii Urban, 1992, by original designation. See Michanthidium. Anthidiini.
- Gnathias Robertson, 1903d:173, 174, 175. Type species: *Nomada bella* Cresson, 1863, by original designation. **Nomadini.**
- Gnathocera Provancher, 1882:232, not Kirby, 1825. Type species: Gnathocera cephalica Provancher, 1882 = Megachile pugnatus Say, 1837, monobasic. See Sayapis. Isotypic with Ceratias by synonymy. Megachilini.
- Gnathodon Robertson, 1903a:168, not Oken, 1816, etc. Type species: Megachile georgica Cresson, 1878, monobasic. See Sarogaster. Megachilini.
- Gnathopasites Linsley and Michener, 1939:272. Type species: *Phileremus fulviventris* Cresson, 1878, by original designation. Isotypic with *Neopasites*. **Biastini**.
- Gnathoprosopis Perkins, 1912:104. Type species: *Prosopis xanthopoda* Cockerell, 1910 = *P. euxantha* Cockerell, 1910, by original designation. **Hylaeinae**.
- Gnathoprosopoides Michener, 1965a:127. Type species: *Prosopis eburniella* Cockerell, 1912 = *Prosopis philoleucus* Cockerell, 1910, by original designation. [Hylaeus]. **Hylaeinae.**
- Gnathosmia Robertson, 1903a:165. Type species: Osmia georgica Cresson, by original designation. Osmiini.
- Gnathoxylocopa Hurd and Moure, 1963:182. Type species: Xylocopa sicheli Vachal, 1898, by original designation. [Xylocopa]. Xylocopini.
- Gnathylaeus Bridwell, 1919:126, 133. Type species: Gnathylaeus williamsi Bridwell, 1919, by original designation. Hylaeinae.
- Gonandrena Viereck, 1917:390. Type species: Andrena persimulata Viereck, 1917, monobasic. [Andrena]. Andreninae.
- Gongyloprosopis Snelling, 1982:16. Type species: *Prosopis* cruenta Vachal, 1910, by original designation. [Hylaeus]. Hylaeinae.
- Goniocolletes Cockerell, 1907c:231. Type species: Goniocolletes morsus Cockerell, 1907, by original designation. Colletinae.
- Graecandrena Warncke, 1968:61. Type species: Andrena gracella Warncke, 1965, by original designation. [Andrena]. Andreninae.
- Grafanthidium Urban, 1995b:435. Type species: Grafanthidium amazonense Urban, 1995, by original designation. Anthidiini.
- Grafella Mitchell, 1980:56. Type species: Pseudocentron crotalariae Schwimmer, 1980, by original designation. [Pseudocentron]. Megachilini.
- Greeleyella Cockerell, 1904d:235. Type species: Greeleyella beardsleyi Cockerell, 1904, by original designation. Panurginae.
- Gressittapis Hirashima, 1978:65. Type species: Palaeorhiza miranda Hirashima, 1978, by original designation. [Palaeorhiza]. Hylaeinae.

- Gronoceras Cockerell, 1907b:65. Type species: Gronoceras wellmani Cockerell, 1907 = Megachile bombiformis Gerstaecker, 1857, by original designation. Megachilini.
- Grosapis Mitchell, 1980:46. Type species: Megachile cockerelli Rohwer, 1923, by original designation. [Eumegachile]. Megachilini.
- Gulanthidium Pasteels, 1969a:101. Type species: Anthidium anguliventre Morawitz, 1888, by original designation. [Anthidium]. Anthidiini
- Gundlachia Cresson, 1865:195, not Pfeiffer, 1850. Type speeies: Centris? cornuta Cresson, 1865, monobasic. See Heterocentris. Centridini.
- Gymnandrena Hedicke, 1933:212. Type species: Apis thoracica Fabricius, 1775, by original designation. [Andrena]. Andreninae.
- Gymnus Spinola, 1808:9. Type species: Apis aterrima Panzer, 1798, not Christ, 1791 = Apis punctulatissima Kirby, 1802, monobasic. Isotypic with Ceraplastes, Stelis, Trachusa Jurine, and Gyrodroma Klug, Anthidiini.
- Gyrodroma Klug, 1807, in Illiger, 1807:198; Klug, 1807b:225. Type species: Apis aterrima Panzer, 1798, not Christ, 1791 = Apis punctulatissima Kirby, 1802, designated by Sandhouse, 1943:555, who incorrectly considered Gyrodroma as monobasic; two species are listed by Klug in Illiger, 1807, which has page priority over Klug, 1807b. Isotypic with Stelis, Trachusa Jurine, and Gymnus. Anthidiini.
- Gyrodroma Thomson, 1872:259, not Klug, 1807. Type species: Heriades nigricornis Nylander, 1848 = Heriades rapunculi Lepeletier, 1841, by designation of Cockerell, 1925b:205. See Gyrodromella. Osmiini.
- Gyrodromella Michener, **new name**, replacement for Gyrodroma Thomson, 1872. Type species: Heriades nigricornis Nylander, 1848 = Heriades rapunculi Lepeletier, 1841, autobasic and present designation. Gyrodromella is considered a subgenus of Chelostoma. [Chelostoma]. **Osmiini**.
- Habralictellus Moure and Hurd, 1982:46. Type species: Halictus auratus Ashmead, 1900, by original designation. Halictini.
- Habralictus Moure, 1941a:59. Type species: Habralictus flavopictus Moure, 1941, by original designation. Halictini.
- *Hubromelissa* Hirashima and LaBerge, 1964, *in* Hirashima, 1964:71. Type species: *Andrena omogensis* Hirashima, 1953, by original designation. [Andrena]. **Andreninae.**
- Habrophora Smith, 1854:318, not Erichson, 1846. Type species: Habrophora ezonata Smith, 1854 = Tetralonia tarsata Spinola, 1838, inversed autobasic, because of type designation for replacement name, Habropoda, by Patton, 1879a:477. Anthophorini.
- Habrophorula Lieftinck, 1974:217. Type species: Habropoda nubilipennis Cockerell, 1930, by original designation. Anthophorini.
- Habropoda Smith, 1854:320, replacement for Habrophora Smith, 1854. Type species: Habrophora ezonata Smith, 1854 = Tetralonia tarsata Spinola, 1838, by designation of Patton, 1879a:477. Anthophorini. The subsequent designation of "H.

- zonata" by Taschenberg, 1883:79, is probably an error for *Habrophora ezonata* Smith, 1854.
- Hackeriapis Cockerell, 1922b:267. Type species: Megachile rhodura Cockerell, 1906, by original designation. [Megachile]. Megachilini.
- Hadrorhiza Hirashima, 1980:108. Type species: Prosopis imperialis Smith, 1863, by original designation. [Palaeorhiza].Hylaeinae.
- Haetosmia Popov, 1952:104. Type species: Osmia latipes Morawitz, 1875 = Osmia brachyura Morawitz, 1875, monobasic. [Anthocopa]. Osmiini.
- Halictanthrena Ducke, 1907:364. Type species: Halictanthrena malpighiacearum Ducke, 1907, monobasic. Colletinae.
- Halictillus Moure, 1947a:7. Type species: Chloralictus loureiroi Moure, 1941, by original designation. Augochlorini.
- Halictoides Nylander, 1848:195. Type species: Halictoides dentiventris Nylander, 1848, by designation of Cockerell and Porter, 1899:420. Rophitinae.
- Halictomorpha Schrottky, 1911:81. Type species: Halictomorpha phaedra Schrottky, 1911, by original designation. Halictini.
- Halictonomia Pauly, 1980:123. Type species: Halictus decemmaculatus Friese, 1900, by original designation. [Nomia]. Nomiinae.
- Halictus Latreille, 1804:182. Type species: Apis quadricincta Fabricius, 1776, by designation of Richards, 1935:170. Apis rubicunda Christ, 1791, designated by Curtis, 1833:pl. 448a, was not an originally included species. A discussion of type designations is in Michener (1978a). Omitted from that discussion was Westwood's (1840a:84) and Cockerell's (1931f:529) designation of Apis sexcincta Fabricius, 1775, as the type species of Halictus. As noted in that discussion, A. sexcincta was not an originally included species. Blanchard, 1849:pl. 125 (1847), designated "Halictus flavipes Panz." as the type species of the genus. He could have meant Apis flavipes Panzer, 1798, a nomen dubium according to Ebmer (1988). Blanchard, however, was careless about the authors' names placed after species names in the explanations of plates, and probably he actually meant to cite the well-known Apis flavipes Fabricius, 1787 (= Apis tumulorum Linnaeus, 1758), a species of the subgenus Seladonia, as the type species of Halictus. Fortunately, the name Halictus, with Apis quadricincta Fabricius, 1776, as the type species, is on the Official List of Generic Names in Zoology (Commission Opinion 1713, 1993). Halictini.
- Halterapis Michener, 1969: 289. Type species: Allodape nigrinervis Cameron, 1905, by original designation. Allodapini.
- Hamatothrix Urban, 1989:121. Type species: Hamatothrix silvai Urban, 1989, by original designation. Eucerini.
- Haplocoelioxys Mitchell. 1973:85. Type species: Coelioxys mexicana Cresson, 1878, by original designation. [Coelioxys]. Megachilini.
- Haplomelitta Cockerell, 1934a:446. Type species: Rhinochaetula ogilviei Cockerell, 1932, by original designation. Dasypodinae.

- Haplosamba Michener, 1981:66. Type species: Haplomelitta tridentata Michener, 1981, by original designation. [Haplomelitta]. Dasypodinae.
- Hauffapis Armbruster, 1938:37. Type species: Hauffapis scheuthlei Armbruster, 1938 = Apis armbrusteri Zeuner, 1931, by designation of Zeuner and Manning, 1976:243. Hauffapis is not a valid name because no type species was designated by Armbruster; original type designation is required for genus-group names proposed after 1930 [Code, 3rd ed., Art. 13(c)]. The subsequent type designation by Zeuner and Manning was in the synonymy of Apis and thus does not validate the name as Hauffapis Zeuner and Manning [Code, 3rd ed., Art. 11(c)]. Fossil. Apini.
- Helicosmia Thomson, 1872:233, no included species; Schmiedeknecht, 1885:22, included species. Type species: Apis aurulenta Panzer, 1799, by designation of Michener, 1941:163. [Osmia]. Osmiini.
- Heliomelissodes LaBerge, 1956:1172. Type species: Melissodes desponsa Smith, 1854, by original designation. [Melissodes]. Eucerini.
- Heliophila Klug, 1807, in Illiger, 1807:197; Klug, 1807b:227. Type species: Apis bimaculata Panzer, 1798, monobasic. Heliophila is attributed in the literature to Klug. It was published in two consecutive articles in the same journal and thus simultaneously. The first article was by Illiger, who attributed the name to Klug; the second was by Klug. Dalla Torre (1896) listed both references under the species bimaculata but attributed the genus-group name to Klug, and may therefore be regarded as the first reviser, who decided the authorship of Heliophila. Anthophorini.
- Hemicoelioxys Pasteels, 1968b:133. Type species: Coelioxys gracilis Pasteels, 1968 (not Schenck, 1868) = Hemicoelioxys gracillima Pasteels, 1977, by original designation. [Coelioxys]. Megachilini.
- Hemicotelles Toro and Cabezas, 1977:46. Type species: Lonchopria ruizii Herbst, 1923, by original designation. Colletinae.
- Hemidiellum Pasteels, 1972:112. Type species: Eoanthidium semicarinatum Pasteels, 1972, monobasic. [Eoanthidium].Anthidiini.
- Hemieucera Sitdikov and Pesenko, 1988:88. Type species: Eucera paraclypeata Sitdikov, 1988, by original designation. [Eucera]. Eucerini.
- Hemihalictus Cockerell, 1897a:288. Type species: Panurgus lustrans Cockerell, 1897, by original designation. Halictini,
- Heminomada Cockerell, 1902, in Cockerell and Atkins, 1902:42, footnote. Type species: Nomada obliterata Cresson, 1863, by original designation. [Nomada]. Nomadini.
- Hemiosmia Tkalců, 1975a:34. Type species: Osmia argyropyga Pérez, 1879, by original designation. [Osmia]. Osmiini.
- Hemirhiza Michener, 1965a:147. Type species: Palaeorhiza melliceps Cockerell, 1918, by original designation. Hylaeinae.
- Hemisia Klug, 1807, in Illiger, 1807:198, nomen nudum. Centridini.

- Hemisia Klug, 1807b:213, 227. Type species: Apis haemorrhoidalis Fabricius, 1775, by designation of Cockerell, 1906d:105. Isotypic with Centris. Centridini.
- Hemisiella Moure, 1945c:407. Type species: Apis lanipes Fabricius, 1775, by original designation. Centridini.
- Henicohesma Exley, 1968b:199. Type species: Brachyhesma macdonaldensis Exley, 1968, by original designation. [Brachyhesma]. Euryglossinae.
- Herbstiella Friese, 1916:168, not Stimpson, 1871. Type species: Herbstiella chilensis Friese, 1916, monobasic. See Kelita. Brachynomadini.
- Heriades Spinola, 1808:7. Type species: Apis truncorum Linnaeus, 1758. designated by Latreille, 1810:439. A subsequent designation was Heriades rapunculi Lepeletier, 1841. by Blanchard, 1849:pl. 126 (1846). Taschenberg, 1883:62, listed two species names without indicating that they are synonyms and therefore failed to designate a type species. Isotypic with Trypetes. Osmiini.
- Heriadopsis Cockerell, 1931b:338. Type species: Heriadopsis striatulus Cockerell, 1931, by original designation. Megachilini.
- Hesperandrena Timberlake. 1949, in Lanham, 1949:208. Type species: Andrena escondida Cockerell, 1938, by original designation. [Andrena]. Andreninae.
- Hesperapis Cockerell, 1898a:147. Type species: Hesperapis elegantula Cockerell, 1898, monobasic. Dasypodinae.
- Hesperocolletes Michener, 1965a:75. Type species: Hesperocolletes douglasi Michener, 1965, by original designation. Colletinae.
- Hesperonomada Linsley, 1939b:5. Type species: Hesperonomada melanantha Linsley, 1939, by original designation. Brachynomadini.
- Hesperoperdita Timberlake. 1954:374. Type species: Perdita ruficauda Cockerell, 1916, by original designation. [Perdita]. Panurginae.
- Heteranthidium Cockerell, 1904b:292. Type species: Anthidium dorsale Lepeletier, 1841, by original designation. [Anthidium]. Anthidiini.
- Heterapis Cockerell, 1911a:140, not Linston, 1889. Type species: Heterapis delicata Cockerell, 1911, by original designation. See Heterapoides. Hylaeinae.
- Heterapoides Sandhouse, 1943:557, replacement for Heterapis Cockerell, 1911. Type species: Heterapis delicata Cockerell, 1911, autobasic. Hylaeinae.
- Hetereucera Tkalců, 1978:167. Type species: Eucera hispana Lepeletier, 1841, by original designation. [Eucera]. Eucerini.
- Heterocentris Cockerell, 1899a:14, replacement for Gundlachia Cresson, 1865. Type species: Centris? cornuta Cresson, 1865 = Centris difformis Smith, 1854. autobasic. Isotypic with Rhodocentris by synonymy. Centridini.
- Heterocolletes Rayment, 1935:184. Type species: Paracolletes capillatus Rayment, 1935, by original designation. [Paracolletes] Colletinae.

- Heteroediscelis Toro and Moldenke, 1979:112. Type species: Chilicola mantagua Toro and Moldenke, 1979, by original designation (misspelled Heteroesdiscelis in heading but correct elsewhere). Xeromelissinae.
- Heterohesma Michener, 1965a:97. Type species: Stilpnosoma clypeata Rayment, 1954, by original designation. Euryglossinae.
- Heteromegachile Rebmann, 1970:41. Type species: Chalicodoma lefebvrei Lepeletier, 1841, by original designation. [Megachile]. Isotypic with Allochalicodoma. Megachilini.
- Heteroperdita Timberlake, 1954:365. Type species: Perdita rhodogastra Timberlake, 1954, by original designation. [Perdita]. Panurginae.
- Heterorhiza Cockerell, 1929b:316. Type species: Palaeorhiza melanura Cockerell, 1910, by original designation. [Palaeorhiza]. Hylaeinae.
- Heterosarus Robertson, 1918a:91. Type species: Calliopsis parvus Robertson, 1892, by original designation. Panurginae.
- Heterosmia Tkalců, 1993a:56, nomen nudum. [Osmia]. Osmiini.
- Heterostelis Timberlake, 1941:125. Type species: Stelis anthidioides Timberlake, 1941, by original designation. [Stelis]. Anthidiini.
- Heterotrigona Schwarz, 1939a:96. Type species: Trigona itama Cockerell, 1918, by original designation. [Trigona]. Meliponini.
- Hexantheda Ogloblin, 1948:172. Type species: Hexantheda missionica Ogloblin, 1948, by original designation. Colletinae.
- Hexaperdita Timberlake, 1954:416. Type species: Perdita ignota Cockerell, 1896, by original designation. [Perdita]. Panurginae.
- Hexataenites Pesenko, 1984:348. Type species: Apis sexcincta Fabricius, 1775, by original designation. [Halictus]. Halictini.
- Hexepeolus Linsley and Michener, 1937:77, 81. Type species: Hexepeolus mojavensis Linsley and Michener, 1937 = Hexepeolus rhodogyne Linsley and Michener, 1937, by original designation. **Hexepeolini.**
- Hexosmia Michener, 1943:74. Type spècies: Osmia copelandica Cockerell, 1908, by original designation. [Anthocopa]. Osmiini.
- Hofferia Tkalců, 1984a:10. Type species: Chelostoma schmiedeknechti Schletterer, 1889, by original designation.Osmiini.
- Holandrena Pérez, 1890:176. Type species: Melitta labialis Kirby, 1802, by designation of Hedicke, 1933:214. [Andrena]. Andreninae.
- Holcomegachile Moure, 1953c:119. Type species: Megachile giraffa Schrottky, 1913, by original designation. [Megachile]. Megachilini.
- Holcopasites Ashmead, 1899a:82, no species. Crawford (1915) included species. Type species: Phileremus illinoiensis Robertson, 1891, by designation of Crawford, 1915:123. Ammobatoidini.

- Holmbergeria Jörgensen, 1912:100. Type species: Holmbergeria cristariae Jörgensen, 1912, monobasic. Colletinae.
- Holmbergiapis Cockerell, 1918b:36, replacement for Scirtetica Holmberg, 1903. Type species: Scirtetica antarctica Holmberg, 1903, autobasic. See Alloscirtetica. Eucerini.
- Holohesma Michener, 1965a:102. Type species: Stilpnosoma semisericea Cockerell, 1905 = Sericogaster fasciatus Westwood, 1835, by original designation. Isotypic with Sericogaster by synonymy. Euryglossinae.
- Holonomada Robertson, 1903d:174, 175, 176. Type species: Nomada superba Cresson, 1863, by original designation. Nomadini.
- Homachthes Dalla Torre, 1896:499, unjustified emendation of Omachthes Gerstaecker, 1869. Ammobatini.
- Homalictus Cockerell, 1919b:13. Type species: Halictus taclobanensis Cockerell, 1915, by original designation. [Halictus]. Halictini.
- Homotrigona Moure, 1961:200. Type species: Trigona fimbriata Smith, 1857, by original designation. Meliponini.
- Honanthidium Pasteels, 1969a:88. Type species: Anthidium honestum Cockerell, 1936, by original designation. Anthidiini.
- Hoplandrena Pérez, 1890:170. Type species: Melitta trimmerana Kirby, 1802, by designation of Hedicke, 1933:214. [Andrena]. Andreninae.
- Hoplepicharis Moure, 1945b:300. Type species: Epicharis fasciata Lepeletier and Serville, 1825, by original designation. Centridini.
- Hopliphora Lepeletier, 1841:458. Type species: Mesocheira velutina Lepeletier and Serville, 1825, monobasic. Isotypic with Oxynedys by synonymy. Ericrocidini.
- Hoplitella Cockerell, 1910d:169, not Levinsen, 1909. Type species: Hoplitella pentamera Cockerell, 1910 = Asluneadiella howardi Cockerell, 1910, monobasic. See Hoplitina. Osmiini.
- Hoplitina Cockerell, 1913:34, replacement for Hoplitella Cockerell, 1910. Type species: Hoplitella pentamera Cockerell, 1910 = Ashmeadiella howardi Cockerell, 1910, autobasic and by original designation. Osmiini.
- Hoplitis Klug, 1807b:225. Type species: Apis adunca Panzer, 1798, monobasic. Isotypic with Ctenosmia. Osmiini.
- Hoplitocopa Lieftinck, 1955:27. Type species: Xylocopa assimilis Ritsema, 1880, by original designation. [Xylocopa]. Xylocopini.
- Hoplocolletes Michener, 1965a:42. Type species: Dasycolletes ventralis Friese, 1924, by original designation. [Leioproctus]. Colletinae.
- Hoplonomia Ashmead, 1904b:4. Type species: Hoplonomia quadrifasciata Ashmead, 1904, by designation of Cockerell, 1910f:289. Nomiinae.
- Hoplopasites Ashmead, 1898:284. Type species: *Phileremus productus* Cresson, 1879, by original designation. **Dioxyini.**
- Hoploprosopis Hedicke, 1926:415. Type species: Prosopis quadricornis Hedicke, 1926, by original designation. [Prosopis]. Hylaeinae.

- Hoplosmia Thomson, 1872:233, no included species; Schmiedeknecht, 1884:23, included species. Type species: Apis spinulosa Kirby, 1802, by designation of Michener, 1941:161. [Osmia]. Osmiini.
- Hoplostelis Dominique, 1898:60, no valid included species; Griswold and Michener, 1988:36, included species. Type species: Stelis abnormis Friese, 1925 = Anthidium bivittatum Cresson, 1878, by designation of Griswold and Michener, 1988:36. Isotypic with Odontostelis. Anthidiini.
- Hoploxylocopa Hurd and Moure, 1963:260. Type species: *Xylocopa acutipennis* Smith, 1854, by original designation. [Xylocopa]. **Xylocopini.**
- Hortibombus Skorikov, 1938a:146, unjustified emendation of Hortobombus Vogt, 1911. **Bombini.**
- Hortobombus Vogt, 1911:56. Type species: Apis hortorum Linnaeus, 1761, by designation of Sandhouse, 1943:559. [Bombus]. Bombini.
- Hylaeana Michener, 1954:28. Type species: Hylaeus panamensis Michener, 1954, by original designation. [Hylaeus]. Hylaeinae.
- Hylaeoides Dalla Torre, 1896:51, unjustified emendation of Hyleoides Smith, 1853. Hylaeinae.
- Hylaeopsis Michener, 1954:27. Type species: *Prosopis mexicana* Cresson, 1869, by original designation. [Hylaeus]. **Hylaeinae.**
- Hylaeorhiza Michener, 1965a:141. Type species: *Prosopis nubilosa* Smith, 1853, by original designation. **Hylaeinae.**
- Hylaeosoma Ashmead, 1898:284. Type species: Hylaeosoma longiceps Ashmead, 1898, by original designation. Xeromelissinae.
- Hylaeteron Michener, 1965a:126. Type species: *Prosopis pulchricrus* Cockerell, 1915 = *Euryglossa semirufa* Cockerell, 1914, by original designation. [Hylaeus]. **Hylaeinae.**
- Hylaeus Fabricius, 1793:302. Type species: Prosopis annulata Fabricius, 1804 = Apis annulata Linnaeus, 1758, by designation of Latreille, 1810:438. Sphex signata Panzer, 1798 = Mellinus bipunctatus Fabricius, 1798, designated by Blanchard, 1849:pl. 125 (1847) was not originally included. Hylaeinae. Apis quadricincta Fabricius, 1776, was designated as the type species of Hylaeus by Warncke, 1970:747. Warncke's arguments do not justify this designation, which would transfer the name Hylaeus from the Colletidae to the Halictidae. Isotypic with Halictus. Halictinae.
- Hyleoides Smith, 1853:32. Type species: Vespa concinna Fabricius, 1775, by designation of Taschenberg, 1883:45. **Hylaeinae.**
- Hyloeosoma Ashmead, 1899b:376, error for Hylaeosoma Ashmead, 1898. **Xeromelissinae**.
- Hypanthidiodes Moure, 1947a:35. Type species: Anthidium flavofasciatum Schrottky, 1902, by original designation. Anthidiini.
- Hypanthidioides Michener, 1948a:22; Moure and Urban, 1975:837; Urban, 1993:28, error for Hypanthidiodes Moure, 1947. Anthidiini.

- Hypanthidium Cockerell, 1904b:292. Type species: Anthidium flavomarginatum Smith, 1879, by original designation. Anthidiini.
- Hyperandrena Pittioni, 1948:58. Type species: Apis bicolorata Rossi, 1790, by original designation. [Andrena]. Andreninae.
- Hyphesma Michener, 1965a:103. Type species: Pachyprosopis atromicans Cockerell, 1913, by original designation. Euryglossinae.
- Hypnorobombus Quilis, 1927:97. Type species: Apis hypnorum Linnaeus, 1758, monobasic. [Bombus]. Isotypic with Pyrobombus, Anodontobombus, and Uncobombus. Bombini.
- Hypochrotaenia Holmberg, 1886b:234, 273. Type species: Hypochrotaenia parvula Holmberg, 1886, monobasic. Nomadini.
- Hypomacrotera Cockerell and Porter, 1899:418. Type species: Hypomacrotera callops Cockerell and Porter, 1899, by original designation. **Panurginae**.
- Hypotrigona Cockerell, 1934b:47. Type species: Trigona gribodoi Magretti, 1884, by original designation. [Trigona]. Meliponini.
- Icteranthidium Michener, 1948a:25. Type species: Anthidium limbiferum Morawitz, 1875, by original designation. Anthidiini.
- Idiomelissodes LaBerge, 1956:1027. Type species: Melissodes duplocincta Cockerell, 1905, by original designation. [Melissodes]. Eucerini.
- Idioprosopis Meade-Waldo, 1914a:451. Type species: Idioprosopis chalcidiformis Meade-Waldo, 1914, by original designation. **Xeromelissinae.**
- Immanthidium Pasteels, 1969a:89. Type species: Anthidium immaculatum Smith, 1854, by original designation. Anthidiini.
- Imperfecta Méhelÿ, 1935:48, 154. Invalid because no type species was designated. [Prosopis]. Sandhouse's (1943:560) view that Popov (1939) designated a type species and thus validated the name is incorrect. **Hylaeinae**.
- Indanthidium Michener and Griswold, 1994a:315. Type species: Indanthidium crenulaticauda Michener and Griswold, 1994, by original designation. **Anthidiini.**
- Indohalictus Blüthgen, 1931:291. Type species: Halictus buccinus Vachal, 1894, by original designation. [Halictus]. Halictini.
- Inhalictus Warncke, 1975b:96. Type species: Hylaeus interruptus Panzer, 1798, by original designation. [Halictus]. Halictini.
- *Inquilina* Michener, 1961:179. Type species: *Exoneura excavata* Cockerell, 1922, by original designation. **Allodapini.**
- *lomelissa* Robertson, 1900:50. Type species: *Andrena violae* Robertson, 1891, monobasic. **Andreninae.**
- *loxylocopa* Hurd and Moure, 1963:116. Type species: *Xylocopa chrysopoda* Schrottky, 1902, by original designation. [Xylocopa]. **Xylocopini.**

- Ischnocera Shuckard. 1840:166, no included species; Smith, 1854:284 included Ischnocera as a synonym of Ctenioschelus, with the single species latreillii Lepeletier. Type species: Melissoda latreillii Lepeletier, 1841 = Acanthopus goryi Romand, 1840, first included species. Ctenioschelus Romand was published in November, 1840. Ischnocera Shuckard probably appeared in December. 1840, for in the preface of the volume in which this name was proposed is a note dated "Nov. 1840," and a copy of the volume in the Natural History Museum, London, bears the handwritten notation "Dec. 1840" (information thanks to Julie Harvey, Librarian). Ctenioschelus therefore appears to have priority, as well as universal usage since 1840. Isotypic with Ctenioscelus by synonymy. Ericrocidini.
- Isepeolus Cockerell, 1907b:64. Type species: Isepeolus albopictus Cockerell, 1907 = Epeolus viperinus Holmberg, 1886, monobasic. Isotypic with Palinepeolus and Calospiloma by synonymy. Isepeolini.
- *Isomalopsis* Michener and Moure, 1957:434. Type species: *Tetralonia niveata* Friese, 1908, by original designation. **Exomalopsini.**
- Isosmia Michener and Sokal, 1957:159. Type species: Anthocopa rubrella Michener. 1949, by original designation. [Anthocopa]. Osmiini.
- Jaxartinula Popov, 1963:865. Type species: Jaxartinula malyshevi Popov, 1963, by original designation. Osmiini.
- *Kallobombus* Dalla Torre, 1880:40. Type species: *Apis soroeensis* Fabricius, 1776, by designation of Sandhouse, 1943:561. [Bombus]. Isotypic with *Soroeensibombus*. **Bombini**.
- Katamegachile Rebmann, 1970:43. Type species: Megachile manicata Giraud, 1861, by original designation. [Megachile]. Megachilini.
- Kelita Sandhouse, 1943:561, replacement for Herbstiella Friese, 1916. Type species: Herbstiella chilensis Friese, 1916, autobasic. Brachynomadini.
- Kelneriapis Sakagami, 1978(June):232. Type species: Trigona eocenica Kelner-Pillault, 1970, monobasic. Isotypic with Kelnermelia. Fossil. Meliponini.
- Kelnermelia Moure and Camargo, 1978(Nov. 17): 565. Type species: Trigona eocenica Kelner-Pillault, 1970, by original designation. Isotypic with Kelneriapis. Fossil. Meliponini.
- Kirbya Lepeletier, 1841:145, not Robineau-Desvoidy, 1830. Type species: *Melitta tricincta* Kirby, 1802, by designation of Sandhouse, 1943:561. Not replaced because synonym of *Melitta*. Isotypic with *Melitta*. **Melittinae**.
- *Koptobaster* Popov, 1939:168, error for *Koptogaster* Alfken. 1912. [Prosopis] **Hylaeinae.**
- Koptogaster Alfken, 1912:23. Type species: Prosopis bifasciata Jurine, 1807, by designation of Meade-Waldo, 1923:16. [Prosopis]. Hylacinae.
- Koptorthosoma Dalla Torre, 1896:202, unjustified emendation of Koptortosoma Gribodo, 1894. **Xylocopini.**
- Koptortosoma Gribodo, 1894:271. Type species: Koptortosoma gabonica Gribodo, 1894, by designation of Sandhouse,

- 1943:561. Vitzthum (1930) implied that *Apis aestuans* Linnaeus, 1758, should be the type species of *Koptorthosoma*, but his wording does not unambiguously make a type designation. Both *gabonica* and *aestuans* were originally included species and both fall in the subgenus *Koptortosoma* as now understood. **Xylocopini.**
- *Kozlovibombus* Skorikov, 1922b:152. Type species: *Bombus kozlovi* Skorikov, 1909 = *Bombus keriensis* Morawitz, 1886, by designation of Sandhouse, 1943:561. **Bombini.**
- Kozlowibombus Bischoff, 1936:10, unjustified emendation of Kozlovibombus Skorikov, 1922. [Bombus]. Bombini.
- Kumobia Popov, 1962:300. Type species: Osmia tenuicornis Morawitz, 1875, by original designation. Osmiini.
- Kylopasiphae Michener, 1989:641. Type species: Leioproctus pruinosus Michener, 1989, by original designation. [Leioproctus]. Colletinae.
- Laboriopsithyrus Frison, 1927:69. Type species: Bombus laboriosus Fabricius, 1804, by original designation. The specific name was misapplied by Frison and others, who considered it to be a species of Psithyrus. See Citrinopsithyrus and Williams (1991). [Psithyrus]. Anthophorini.
- Labrohalictus Pauly, 1981:719. Type species: Lasioglossum saegeri Pauly, 1981, monobasic. [Lasioglossum]. Halictini.
- Laccohylaeus Houston, 1981:88. Type species: *Prosopis* cyanophila Cockerell, 1910, by original designation. [Hylaeus]. **Hylaeinae.**
- Laesibombus Skorikov, 1938a:145, unjustified emendation of Laesobombus Krüger, 1920 or Skorikov, 1922. Bombini.
- Laesobombus Krüger, 1920:350. Type species: Bombus laesus Morawitz, 1875, monobasic. [Agrobombus]. Isotypic with Laesobombus Skorikov. Bombini.
- Laesobombus Skorikov, 1922b:150. Type species: Bombus laesus Morawitz. 1875, monobasic. [Agrobombus]. Junior synonym and homonym of Laesobombus Krüger. Isotypic with Laesobombus Krüger. Bombini.
- Lagobata Smith, 1861:151. Type species: Lagobata diligens Smith, 1861 = Ancyloscelis ornata Spinola, 1853, monobasic. **Tetrapediini.**
- Lagripoda Vachal, 1909b:7. Latinization of Lagripode Lepeletier and Serville, 1828; these authors gave a few characters but included no species. Unrecognizable.
- Lagripode Lepeletier and Serville, 1828:795. French vernacular; see Lagripoda Vachal, 1909. Unrecognizable.
- Lambdopsis Méhelÿ, 1935:65, 171. Invalid because no type species was designated. [Prosopis]. **Hylaeinae.**
- Lambdopsis Popov, 1939:169. Type species: Melitta annularis Kirby, 1802, by original designation. [Prosopis]. Hylaeinae.
- Laminomada Rodeck, 1947:266. Type species: Nomada hesperia Cockerell, 1903, by original designation. [Nomada]. Nomadini.
- Lampralictus Pesenko. 1984:348. Type species: Halictus modernus Morawitz, 1876, by original designation. [Halictus]. Halictini.

- Lamproapis Cameron, 1902a:419. Type species: Lamproapis maculipennis Cameron, 1902, monobasic. Nomadini.
- Lamprocolletes Smith, 1853:10. Type species: Andrena chalybeata Erichson, 1851, by designation of Cockerell, 1905a:345. Isotypic with Nodocolletes by synonymy. Colletinae.
- Lanthanella Michener and Moure, 1957:417. Type species: Lanthanomelissa completa Michener and Moure, 1957, by original designation. [Lanthanomelissa]. **Tapinotaspidini.**
- Lanthanomelissa Holmberg, 1903:418. Type species: Lanthanomelissa discrepans Holmberg, 1903, monobasic. Tapinotaspidini.
- Lapidariibombus Skorikov, 1938a:145, unjustified emendation of Lapidariobombus Vogt, 1911. Bombini.
- Lapidariobombus Vogt, 1911:58. Type species: Apis lapidaria Linnaeus, 1758, by designation of Sandhouse, 1943:562. [Bombus]. Isotypic with Melanobombus. **Bombini.**
- Lapponicobombus Quilis, 1927:19, 22, 63. Type species: Apis lapponica Fabricius, 1793, by designation of Milliron, 1961:58. [Bombus]. Bombini.
- Larandrena LaBerge, 1964:304. Type species: Andrena miserabilis Cresson, 1872, by original designation. [Andrena]. Andreninae.
- Largella Pasteels, 1965:534. Type species: Megachile semivestita Smith, 1853, by original designation. [Chalicodoma]. Megachilini.
- *Larinostelis* Michener and Griswold, 1994a:317. Type species: *Larinostelis scapulata* Michener and Griswold, 1994, by original designation. **Anthidiini.**
- Lasanthidium Romankova, 1988:26. Type species: Stelis malaisei Popov, 1941, by original designation. Anthidiini.
- Lasioglossum Curtis, 1833:448. Type species: Lasioglossum tricingulum Curtis, 1833 = Melitta xanthopus Kirby, 1802, by original designation. Halictini.
- Lasius Jurine, 1801:164. Type species: Apis quadrimaculata Panzer, 1798, monobasic. Suppressed by Commission Opinion 135 (1939), Direction 4. Isotypic with Dasymegilla. Anthophorini.
- Lasius Panzer, 1804b:tab. 16. Type species: Lasius salviae Panzer, 1804 = Anthophora crinipes Smith, 1854, monobasic. Suppressed by Commission Opinion 151 (1944), Direction 4. According to Opinion 151, the correct date for Lasius Panzer is [1801-1802]; see Literature Cited. Anthophorini.
- Legnanthidium Griswold and Michener, 1988:27. Type species: Anthidium ridingsii Cresson, 1878, by original designation. [Trachusa]. Anthidiini.
- Leimelissa Osychnyuk, 1984b:20. Type species: Andrena bairucumensis Morawitz, 1876, by original designation. [Andrena]. Andreninae.
- *Leiopodus* Smith, 1854:252. Type species: *Leiopodus lacertinus* Smith, 1854, monobasic. **Protepeolini.**

- Leioproctus Smith, 1853:8. Type species: Leioproctus imitatus Smith, 1853, by designation of Cockerell, 1905a:348. Colletinae.
- Lepidandrena Hedicke, 1933:215. Type species: Andrena curvungula Thomson, 1870, by original designation. [Andrena]. Andreninae.
- Lepidorhopalomelissa Wu, 1985:58. Type species: Nomia burmica Cockerell, 1920, by original designation. [Rhopalomelissa]. Nomiinae.
- Lepidotrigona Schwarz, 1939a:132. Type species: *Trigona nitidiventris* Smith, 1857, by original designation. [Trigona]. **Meliponini.**
- Leptergates Holmberg, 1887b:224, nomen nudum. Emphorini.
- Leptergatis Holmberg, 1903:422. Type species: Leptergatis halictoides Holmberg, 1903, by designation of Lutz and Cockerell, 1920:592. Emphorini.
- Leptoglossa Friese, 1925a:9, not Klug, 1839. Type species: Leptoglossa paradoxa Friese, 1925 = Orphana inquirenda Vachal, 1909, monobasic. See Orphana. Isotypic with Ptoleglossa; isotypic with Orphana by synonymy. Andreninae.
- Leptometria Holmberg, 1903:409. Type species: Leptometria pereyrae Holmberg, 1903, by designation of Brèthes, 1910:213. Emphorini.
- Leptophanthus Ruz and Toro, 1983:277. Type species: Psaenythia nigra Friese, 1916 (not Friese, 1908) = Liphanthus nitidus Ruz and Toro, 1983, by original designation. [Liphanthus]. Panurginae.
- Leptorachina Mitchell, 1980:56. Type species: Megachile laeta Smith, 1853, by original designation. [Pseudocentron]. Megachilini.
- Leptorachis Mitchell, 1934:301, 308. Type species: Megachile petulans Cresson, 1878, by original designation. [Megachile]. Megachilini.
- Lestis Lepeletier and Serville, 1828:799. Type species: Apis bombylans Fabricius, 1775 (misidentified as Apis muscaria Fabricius, 1775; see Hurd and Michener, 1961), monobasic, fixed by Commission Opinion 657 (1963). Xylocopini.
- Lestrimelitta Friese, 1903a:361. Type species: Trigona limao Smith, 1863, monobasic. [Trigona]. Meliponini.
- Leucandrena Hedicke, 1933:215. Type species: Apis sericea Christ, 1791 (not Forster, 1771) = Melitta barbilabris Kirby, 1802, by original designation. [Andrena]. Andreninae.
- Leuchalictus Warncke, 1975b:98. Type species: Apis leucozonia Schrank, 1781, by original designation. [Halictus]. Halictini.
- Leucobombus Dalla Torre, 1880:40. Type species: Apis terrestris Linnaeus, 1758, by designation of Sandhouse, 1943:564. [Bombus]. Isotypic with Bremus Jurine, Bremus Panzer, Bombus, and Terrestribombus. Bombini.
- Leuconomia Pauly, 1980:124. Type species: Nomia candida Smith, 1875, by original designation. [Nomia]. Nomiinae.
- Leucosmia Robertson, 1903a:166, 171. Type species: Osmia albiventris Cresson, 1864, by original designation. Osmiini.

- *Leucostelis* Noskiewicz, 1961:126, 132. Type species: *Gyrodroma ornatula* Klug, 1807, by original designation (p. 132). [Stelis]. **Anthidiini.**
- Leurotrigona Moure, 1950a:244. Type species: Trigona muelleri Friese, 1900, by original designation. [Hypotrigona]. Meliponini.
- Libellulapis Cockerell, 1906a:42. Type species: Libellulapis antiquorum Cockerell, 1906, monobasic. Fossil.
- Lieftinckella Hurd and Moure, 1963:286. Type species: *Xylocopa smithii* Ritsema, 1876, by original designation. [Xylocopa]. **Xylocopini.**
- *Lioceratina* Vecht, 1952:32. Type species: *Ceratina flavopicta* Smith, 1858, by original designation. [Ceratina]. **Ceratinini**.
- Liogastra Perty, 1833:146. Type species: Liogastra bicolor Perty, 1833 = Rhathymus bicolor Lepeletier and Serville, 1828, monobasic. Isotypic with Colax and Rhathymus by synonymy. Rhathymini.
- *Liopodus* Schulz, 1906:258, unjustified emendation of *Leiopodus* Smith, 1854. **Protepeolini.**
- *Liopoeodes* Ruz, 1991:236. Type species: *Calliopsis xenopous* Ruz, 1991, by original designation. [Calliopsis]. **Panurginae.**
- *Liopoeum* Friese, 1906b:176. Type species: *Camptopaeum hirsutulum* Spinola, 1851, by designation of Sandhouse, 1943:564. [Camptopoeum]. **Panurginae.**
- *Lioproctus* Smith, 1879:6, unjustified emendation of *Leioproctus* Smith, 1853. **Colletinae.**
- Liosmia Thomson, 1872:233, no included species; Friese, 1911b:438, included species. Type species: Osmia claviventris Thomson, 1872, by designation of Michener, 1941:159. [Osmia]. Osmiini.
- *Liothgraphis* Sandhouse, 1943:564, incorrect subsequent spelling of *Liothgrapis* Cockerell, 1932. **Megachilini.**
- *Liothgrapis* Cockerell, 1932:26, incorrect subsequent spelling of *Liothyrapis* Cockerell, 1911. [Coelioxys]. **Megachilini.**
- Liothyrapis Cockerell, 1911b:246. Type species: Coelioxys apicata Smith, 1854 = Coelioxys decipiens Spinola, 1838, by original designation. [Coelioxys]. Megachilini.
- Liotrigona Moure, 1961:223. Type species: *Trigona bottegoi* Magretti, 1895 = ? *Trigona madecassa* Saussure, 1891, by original designation. **Meliponini.**
- *Liphanthus* Reed, 1894:645. Type species: *Liphanthus sabulosus* Reed, 1894, monobasic. **Panurginae.**
- *Lipotriches* Gerstaecker, 1857:460. Type species: *Lipotriches abdominalis* Gerstaecker, 1857 = *Sphecodes cribrosa* Spinola, 1843, monobasic. **Nomiinae.**
- *Lisotrigona* Moure, 1961:194. Type species: *Melipona cacciae* Nurse, 1907, by original designation. **Meliponini.**
- Lissopedia Moure, 1994b:306. Type species: Tetrapedia globulosa Friese, 1899, by original designation. Tapinotaspidini
- Lithandrena Cockerell, 1906a:44. Type species: Lithandrena saxorum Cockerell, 1906, monobasic. Fossil.

- Lithanthidium Cockerell, 1911d:225. Type species: Lithanthidium pertriste Cockerell, 1911, monobasic. Fossil.
- Lithosmia Alfken, 1935:188. Type species: Megachile villosa Schenck, 1853, not Apis villosa Fabricius, 1775 = Osmia platycera Gerstaecker, 1869. [Osmia]. Isotypic with Arctosmia. Osmiini.
- Lithurge Latreille, 1825:463. Type species: Andrena cornuta Fabricius, 1787, monobasic. Latreille's original spelling (1825) has been regarded by many authors as French vernacular unavailable as a scientific name (e.g., Fox, 1902). Such authors use the emended Latinized form Lithurgus Berthold (1827), published in a translation of Latreille's work into German. The spelling Lithurge, as noted by Fox (1902), was used by Lepeletier and Serville (1828:795) but they were writing in French and used other French vernacular names. Lithurge was shown as the correct name by Sandhouse (1943) and has since been used by Michener (1944, 1951), Hurd (1979), and others in major studies and catalogues. I now believe, however, that the authors using Lithurgus are correct. Lithurgini.
- Lithurgonuna Moure, 1949b:277. Type species: Lithurgonuna wagenknechti Moure, 1949, by original designation. Trichothurgus Moure and Lithurgomma were published simultaneously. Michener (1983) synonymized these names as first reviser and selected Trichothurgus as the generic name. Lithurgini.
- Lithurgopsis Fox, 1902:138. Type species: Lithurgus apicalis Cresson, by original designation. Lithurgini.
- Lithurgus Berthold, 1827:467, Latinization of Lithurge Latreille, 1825. Type species: Andrena cornuta Fabricius, 1787, monobasic. Blanchard, 1849:pl. 127 (1846), designated as the type species Lithurgus fuscipennis Lepeletier, 1841, which was not originally included. Lithurgini.
- Litomegachile Mitchell, 1934:301, 308. Type species: Megachile brevis Say, 1837, by original designation. [Megachile]. Megachilini.
- Liturgus Ashmead, 1899a:77, error for Lithurgus Berthold, 1827. Lithurgini.
- Lobonomia Warncke, 1976:99. Type species: Nomia lobata Olivier, 1811, by original designation. [Nomia]. Nomiinae.
- Lomatalictus Michener, 1978a:509. Type species: Halictus malachurinus Cockerell, 1937, by original designation. [Patellapis]. Halictini.
- Lonchoprella Michener, 1989:673. Type species: Lonchopria annectens Michener, 1989, by original designation. [Lonchopria]. Colletinae.
- Lonchopria Vachal, 1905a:204. Type species: Lonchopria herbsti Vachal, 1905 = Colletes zonalis Reed, 1892, monobasic. Colletinae.
- Lonchorhyncha Michener, 1989:667. Type species: Diphaglossa ecuadoria Friese, 1925, by original designation. Colletinae.
- Lophalictus Pesenko, 1986a:125. Type species: Lasioglossum acuticrista Pesenko, 1986, by original designation. [Lasioglossum]. Halictini.

- Lophanthophora Brooks, 1988:464. Type species: Anthophora porterae Cockerell, 1900, by original designation. [Anthophora]. Anthophorini.
- Lophopedia Michener and Moure, 1957:413. Type species: Tetrapedia pygmaea Schrottky, 1902, by original designation. [Paratetrapedia]. Tapinotaspidini.
- Lophothygater Moure and Michener, 1955b:313. Type species: Tetralonia decorata Smith, 1879, by original designation. Eucerini.
- Lophotrigona Moure, 1961:205. Type species: Trigona canifrons Smith, 1857, by original designation. Meliponini.
- Loxoptilus LaBerge, 1957:28. Type species: Loxoptilus longifellator LaBerge, 1957, by original designation. Eucerini.
- Lucasellus Schulz, 1911:202, replacement for Lucasius Dours, 1872. Type species: Halictus clavipes Dours, 1872, autobasic. [Halictus]. Halictini.
- Lucasiellus Cockerell, 1905d:272, replacement for Lucasius Dours, 1872. Type species: Halictus clavipes Dours, 1872, autobasic. [Halictus]. Halictini.
- Lucasius Dours, 1872:350, not Kinahan, 1859. Type species: Halictus clavipes Dours, 1872, by designation of Sandhouse, 1943:566. [Halictus]. See Lucasellus and Lucasiellus. Halictini.
- Lutziella Cockerell, 1922d:1, not Enderlein, 1922. Type species: Perdita opuntiae Cockerell, 1922, by original designation. [Perdita]. See Cockerellula. Panurginae.
- Lysicolletes Rayment, 1935:208. Type species: Paracolletes singularis Rayment, 1935, by original designation. [Paracolletes]. Colletinae.
- Machaeris Robertson, 1903b:104. Type species: Sphecodes stygius Robertson, 1893, by original designation. Halictini.
- Macrocera Latreille, 1810:339, 439, not Meigen, 1803. Type species: Eucera antennata Fabricius, 1793 = Apis malvae Rossi, 1790, by original designation. See Tetralonia. Eucerini.
- Macrogalea Cockerell, 1930f:291. Type species: Allodape candida Smith, 1879, by original designation. Allodapini.
- Macroglossa Radoszkowski, 1884:17. not Ochsenheimer, 1816.
 Type species: Macroglossa oribazi Radoszkowski, 1884 = Macrocera analis Lepeletier, 1841, monobasic. See Macroglossapis. Eucerini.
- Macroglossapis Cockerell, 1899c:14, replacement for Macroglossa Radoszkowski, 1884. Type species: Macroglossa oribazi Radoszkowski, 1884 = Macrocera analis Lepeletier, 1841, autobasic. Isotypic with Thygater by synonymy. Eucerini.
- Macrohylaeus Michener, 1965a:133. Type species: *Prosopis vidua* Smith, 1853 = *Prosopis alcyonea* Erichson, 1842, by original designation. [Hylaeus]. **Hylaeinae.**
- Macromegachile Noskiewicz, 1948:48. Type species: Apis lagopoda Linnaeus, 1761, by original designation. Mitchell, 1980:23, incorrectly listed Apis maritima Kirby, 1802, as the type species. [Megachile]. Megachilini.

- Macronomadopsis Rozen, 1958:93. Type species: Nomadopsis micheneri Rozen, 1958, by original designation. [Nomadopsis]. Panurginae.
- Macronomia Cockerell, 1917c:468. Type species: Nomia platycephala Cockerell, 1917, by original designation. [Nomia]. Nominae.
- Macropis Panzer, 1809:no. 16. Type species: Megilla labiata Fabricius, 1805, monobasic. Macropis has been attributed to Klug (in Panzer, 1809) but as pointed out in Commission Opinion 1383 (1986). Panzer provided the description. Melittinae.
- Macrotera Smith, 1853:130. Type species: Macrotera bicolor Smith, 1853, monobasic. Panurginae.
- Macroterella Timberlake, 1954:360. Type species: Perdita mortuaria Timberlake, 1954, by original designation. [Perdita]. Panurginae.
- Macroteropsis Ashmead, 1899a:85. Type species: Perdita latior Cockerell, 1896, by original designation. Panurginae.
- Maculonomia Wu, 1982:275. Type species: Nomia terminata Smith, by original designation. [Nomia]. Nomiinae.
- Madagalictus Pauly, 1984b:125. Type species: Halictus suarezensis Benoist, 1962, by original designation. Halictini.
- Madrosoma Ashmead, 1899a:94, lapsus for Mydrosoma Smith, 1879. Dissoglottini.
- Maiella Michener, 1942:282, replacement for *Orbitella* Ma, 1938. Type species: *Xylocopa confusa* Pérez, 1901, autobasic. [Xylocopa]. **Xylocopini.**
- Malanthidium Pasteels, 1969a:26. Type species: Anthidium malaccense Friese, 1914, by original designation. Anthidiini.
- Malayapis Baker, 1995a:67. Type species: Andrena chrysochersonesus Baker, 1995, by original designation. [Andrena]. Andreninae.
- Manthidium Pasteels, 1969a:43. Type species: Anthidium binghami Friese, 1901 (first described under the homonymous name Anthidium fraternum Bingham, 1897), by original designation. Anthidiini.
- Manuelia Vachal, 1905b:25. Type species: Halictus gayi Spinola, 1851. by designation of Daly, Michener, Moure, and Sakagami, 1987:104. Sandhouse (1943) designated "Halictus (Corynura) gayi Spinola" as the type species, but this is meaningless since both Halictus gayi and Corynura gayi were described by Spinola in the same work. Manueliini.
- Margandrena Warncke, 1968:91. Type species: Andrena marginata Fabricius, 1776, by original designation. [Andrena]. Andreninae.
- Marghalicius Warncke, 1975b:95. Type species: Hylaeus marginellus Schenck, 1853, by original designation. [Halictus]. Halictini.
- Martinapis Cockerell, 1929f:19, replacement for Martinella Cockerell, 1903. Type species: Melissodes luteicornis Cockerell, 1896, autobasic. Eucerini.
- Martinella Cockerell, 1903c:450, not Jousseaume, 1887. Type species: Melissodes luteicornis Cockerell, 1896, monobasic. [Melissodes]. See Martinapis. Eucerini.

- Massanthidium Pasteels, 1969a:24. Type species: Trachusa flavorufula Pasteels, 1969, by original designation. [Trachusa]. Anthidiini.
- Mastrucatobombus Krüger, 1917:66. Type species: Bombus mastrucatus Gerstaecker, 1869 = Bombus wurflenii Radoszkowski, 1859. monobasic. [Bombus]. Bombini.
- Maximegachile Guiglia and Pasteels, 1961:27. Type species: Megachile maxillosa Guérin-Méneville, 1845, by original designation. [Megachile]. Megachilini.
- Maxschwarzia Pagliano and Scaramozzino, 1990:5, unnecessary replacement for Meganomia Cockerell, 1909; see Michener, 1992. Type species: Nomia binghami Cockerell, 1909, autobasic. Meganomiinae.
- Maynenomia Pauly, 1984d:698. Type species: Nomia maynei Cockerell, 1937 = Nomia testacea Friese, 1914, by original designation. Nomiinae.
- Mecanthidium Michener, 1942:278. Type species: Paranthidium sonorum Michener, 1942, by original designation. [Paranthidium]. Anthidiini.
- Mediocralictus Pauly, 1984b:143. Type species: Halictus mediocris Benoist, 1962, by original designation. [Lasioglossum]. Halictini.
- Megabombus Dalla Torre, 1880:40. Type species: Bombus ligusticus Spinola, 1805 = Apis argillacea Scopoli, 1763, monobasic. [Bombus]. Isotypic with Odontobombus by synonymy. Bombini.
- Megaceratina Hirashima, 1971b:251. Type species: Ceratina bouyssoui Vachal, 1903 = Ceratina sculpturata Smith, 1854, by original designation. Ceratinini.
- Megachile Latreille, 1802a:434. Type species: Apis centuncularis Linnaeus, 1758, by designation of Curtis, 1828:pl. 218. A subsequent designation, Xylocopa muraria Fabricius, 1804 = Apis parietina Fourcroy, 1785, was by Blanchard, 1840:408. Isotypic with Anthemois by synonymy. Megachilini.
- Megachileoides Radoszkowski, 1874b:132. Type species: Trachusa serratulae Panzer, 1804 = Apis byssina Panzer, 1798, by designation of Michener, 1995:375. Isotypic with Trachusa Panzer: isotypic with Diphysis by synonymy. Anthidiini.
- Megachiloides Mitchell, 1924:154. Type species: Megachiloides oenotherae Mitchell, 1924, by original designation. Megachiloides Saussure (1890) is an incorrect subsequent spelling of Megachileoides Radoszkowski and does not preoccupy Megachiloides Mitchell. Megachilini.
- Megachiloides Saussure, 1890:35, incorrect subsequent spelling of Megachileoides Radoszkowski, 1874, see Michener, 1995. Anthidiini.
- Megacilissa Smith, 1853:123. Type species: Megacilissa superba Smith, 1853 = Caupolicana fulvicollis Spinola, 1851, monobasic. Caupolicanini.
- Megahoplitis Tkalců, 1993a:55. Type species: Osmia tigrina Morawitz, 1872, by original designation. [Hoplitis]. Osmiini.
- Megalobombus Schulz, 1906:267, unjustified emendation of Megabombus Dalla Torre, 1880. [Bombus]. Bombini.

- Megalochila Schulz, 1906:263, unjustified emendation of Megachile Latreille, 1802. Megachilini.
- Megalocilissa Schulz, 1906:243, unjustified emendation of Megacilissa Smith, 1853. Caupolicanini.
- Megaloheriades Peters. 1984:366. Type species: Osmia schultzei Friese, 1909, by original designation. Osmiini.
- Megalopta Smith, 1853:83. Type species: Megalopta idalia Smith, 1853, designated by Commission Opinion 788 (1966). The earlier type designation of Megalopta bituberculata Smith, 1853, by Cockerell, 1900a:374, is invalidated. Augochlorini.
- Megaloptella Schrottky, 1906a:312. Type species: Halictus ochrias Vachal, 1904. by original designation. [Megalopta]. Augochlorini.
- Megaloptidia Cockerell. 1900a:373. 374. Type species: Megalopta contradicta Cockerell. 1900, by original designation. [Megalopta]. Augochlorini.
- Megaloptilla Moure and Hurd, 1987:241. Type species: Halictus callopis Vachal, 1911. by original designation. [Megonmation]. Augochlorini.
- Megaloptina Eickwort, 1969:441. Type species: Augochlora ogilviei Cockerell, 1930, by original designation. [Megommation]. Augochlorini.
- Megaloptodes Moure, 1959:183. Type species: Megalopta bituberculata Smith, 1853, by original designation. Nomiinae.
- Megalosmia Schmiedeknecht, 1885:23. Type species: Osmia grandis Morawitz, 1873, by designation of Sandhouse, 1943:568. Osmiini.
- Megamegilla Brooks, 1988:505. Type species: Apis acraensis Fabricius, 1793, by original designation. [Amegilla]. Anthophorini.
- Megandrena Cockerell. 1927a:42. Type species: Andrena enceliae Cockerell, 1927, by original designation. [Andrena]. Andreninae.
- Meganomia Cockerell, 1909a:402. Type species: Nomia binghami Cockerell, 1909, monobasic. [Nomia]. Meganomiinae.
- Meganomioides Pesenko. 1983:183. Type species: Nomioides karachensis Cockerell, 1911. by original designation. [Ceylalictus]. Nomioidinae.
- Meganthidium Popov, 1950a:315. Type species: Anthidium christophi Morawitz. 1884 = Anthidium superbum Radoszkowski, 1876, by original designation. Anthidiini.
- Megapis Ashmead, 1904a:120. Type species: Apis dorsata Fabricius, 1793, by original designation. Apini.
- Megascirtetica Moure and Michener, 1955b:264. Type species: Macrocera mephistophelica Schrottky, 1902, by original designation. **Eucerini**.
- Megaxylocopa Hurd and Moure, 1963:151. Type species: Apis frontalis Olivier, 1789, by original designation. [Xylocopa]. Xylocopini.
- Megella Pasteels, 1965:167. Type species: Megachile malimbana Strand. 1911, by original designation. [Megachile]. Megachilini.

- Meghylaeus Cockerell, 1929b:314. Type species: Palaeorhiza gigantea Cockerell, 1926 = Prosopis fijiensis Cockerell, 1909, by original designation. [Hylaeus]. Hylaeinae.
- Megilla Fabricius, 1804:328. Type species: Apis pilipes Fabricius, 1775 = Apis plumipes Pallas, 1772, designated by Commission Opinion 1383 (1986). Megilla labiata Fabricius, 1804, was designated by Westwood, 1840a:158, and Apis acervorum Linnaeus, 1758, was designated by Richards, 1935:172, as the type species of Megilla. These designations would have made Megilla the correct name for Macropis or a junior synonym of Bombus, respectively, although Apis acervorum was interpreted as an Anthophora at the time of Richard's work. Isotypic with Podalirius and Anthophora. Anthophorini.
- Megomalopsis Michener and Moure, 1957:430. Type species: Exomalopsis diversipes Cockerell, 1949 = Exomalopsis mellipes Cresson, 1878, by original designation. Exomalopsini.
- Megommation Moure, 1943b:479. Type species: Halictus insignis Smith, 1853, by original designation. Augochlorini.
- Mehelya Popov, 1939:167, not Csiki, 1903, replacement for Barbata Méhelÿ, 1935. Type species: Prosopis friesei Alfken, 1904, by original designation. [Prosopis]. See Mehelyana. Hylaeinae.
- Mehelyana Sandhouse, 1943:569, replacement for Barbata Méhely, 1935, and Mehelya Popov, 1939. Type species: *Prosopis friesei* Alfken, 1904, autobasic. **Hylaeinae.**
- Melaliphanthus Ruz and Toro, 1983:271. Type species: Liphanthus atratus Ruz and Toro, 1983, by original designation. [Liphanthus]. Panurginae.
- Melanapis Cameron, 1902a:420. Type species: Melanapis violaceipennis Cameron, 1902 = Andrena fuscosa Erichson, 1835, monobasic. Andreninae.
- Melandrena Pérez, 1890:170. Type species: Apis thoracica Fabricius, 1775, by present designation. Andrena morio Brullé, 1832, designated by Hedicke, 1933:216, was not among the species originally included by Pérez. [Andrena]. Andreninae.
- Melanempis Saussure, 1890:84. Type species: Phileremus ater Saussure, 1890, monobasic. [Phileremus]. Ammobatini.
- Melaneutricharaea Tkalců, 1993b:803. Type species: Megachile hohmanni Tkalců, 1983, by original designation. [Megachile]. Megachilini.
- Melanoanthidium Tkalců, 1967:91. Type species: Anthidium montanum Morawitz, 1864, by original designation. [Anthidium]. Anthidiini.
- Melanobombus Dalla Torre, 1880:40. Type species: Apis lapidaria Linnaeus, 1758, by designation of Sandhouse, 1943:569. [Bombus]. Isotypic with Lapidariobombus. Bombini.
- Melanocentris Friese, 1900:244, 246. Type species: Centris atra Friese, 1899, by designation of Sandhouse, 1943:569. [Centris]. Centridini.
- Melanocoelioxys Mitchell, 1973;78. Type species: Coelioxys tolteca Cresson, 1878, by original designation. [Coelioxys]. Megachilini.

- Melanomada Cockerell, 1903d:587. Type species: Nomada grindeliae Cockerell, 1903, by original designation. [Nomada]. Brachynomadini.
- Melanomia Pauly, 1990:149; also described as new by Pauly, 1991:310. Type species: Nomia melanosoma Benoist, 1963, by original designation. Nomiinae.
- Melanosarus Mitchell, 1934:303, 307. Type species: Megachile xylocopoides Smith, 1853, by original designation. [Megachile]. Megachilini.
- Melanosmia Schmiedeknecht, 1885:19[885]. Type species: Osmia fuciformis Latreille, 1811 = Apis xanthomelana Kirby, 1802, by designation of Sandhouse, 1939:33. [Osmia]. Osmiini.
- Melanostelis Ashmead, 1898:283. Type species: Melanostelis betheli Ashmead, 1898 = Stelis rubi Cockerell, 1898, by original designation. Anthidiini.
- Melanthidium Cockerell, 1947:106. Type species: Melanthidium carri Cockerell, 1947, by original designation. Anthidiini.
- Melanthidium Pasteels, 1969a:90, not Cockerell, 1947. Type species: Anthidium concolor Friese, 1913, by original designation. See Nigranthidium and Warnckeia. Anthidiini.
- Melea Sandhouse, 1943:569, replacement for Anthemoessa Robertson, 1905. Type species: Anthophora abrupta Say, 1837, autobasic. Anthophorini.
- Melecta Latreille, 1802a:427. Type species: Apis punctata Fabricius, 1775 = Apis albifrons Forster, 1771, by designation of Latreille, 1810:439. Isotypic with Symmorpha. Melectini.
- Melectoides Taschenberg, 1883:75. Type species: Melectoides senex Taschenberg, 1883, by original designation. Isepeolini.
- Melectomimus Linsley, 1939a:448. Type species: Melecta edwardsii Cresson, 1878, by original designation. [Melecta]. Melectini.
- Melectomorpha Linsley, 1939a:451, Type species: Melecta californica Cresson, 1878, by original designation. [Melecta]. Melectini.
- Melikerria Moure, 1992:34. Type species: Apis compressipes Fabricius, 1804, by original designation. [Melipona]. Meliponini.
- Meliphila Schrottky, 1902b:310. Type species: Meliphila ipomoeae Schrottky, 1902 = Melitoma euglossoides Lepeletier and Serville, 1828, by original designation. Isotypic with Melitoma by synonymy. Emphorini.
- Meliphilopsis Roig-Alsina, 1994:183. Type species: Meliphilopsis melanandra Roig-Alsina, 1994, by original designation. Emphorini.
- *Meliplebeia* Moure, 1961:229. Type species: *Trigona beccarii* Gribodo, 1879, by original designation. **Meliponini**.
- Melipona Illiger, 1806:157. Type species: Apis favosa Fabricius, 1798, by designation of Latreille, 1810:439. Melipona fulva Lepeletier, 1841, designated by Blanchard, 1849:pl. 129 (1845), was not originally included. Meliponini.
- Meliponorytes Tosi, 1896:352. Type species: Meliponorytes succini Tosi, 1896, by designation of Sandhouse, 1943:570. Fossil. Meliponini.

- Meliponula Cockerell, 1934b:47. Type species: Melipona bocandei Spinola, 1851, by original designation. [Trigona].Meliponini.
- Melissa Smith, 1854:279. Type species: Mesocheira azurea Lepeletier and Serville, 1825, by designation of Sandhouse, 1943:570. Isotypic with Mesoplia. Ericrocidini.
- Melissina Cockerell, 1911e:670. Type species: Melissina viator Cockerell, 1911, monobasic. Eucerini.
- Melissoda Lepeletier, 1841:508. Type species: Melissoda latreillii Lepeletier, 1841 = Acanthopus goryi Romand, 1840, monobasic. Isotypic with Ischnocera; isotypic with Ctenioschelus by synonymy. Ericrocidini.
- Melissode Latreille, 1825:464, nomen nudum, French vernacular. Eucerini?
- Melissodes Berthold, 1827:468, nomen nudum, Latinization of Melissode Latreille. There is no certainty that these names refer to Melissodes Latreille, 1829. They are listed here to avoid possible confusion. Eucerini?
- Melissodes Latreille, 1829:354, no included species. Romand, 1841:6, included Melissodes fonscolombei Romand, 1841; this specific name was suppressed by Commission Opinion 750 (1965). Type species: Melissodes leprieuri Blanchard, 1846, first valid included species and designated as type species by Opinion 750. Taschenberg, 1883:78, subsequently designated Macrocera rustica Say, 1837, as the type species. Eucerini.
- Melissoptila Holmberg, 1884:119. Type species: Melissoptila tandilensis Holmberg, 1884, monobasic. Isotypic with Thyreothremma and Thyreotremata by synonymy. Eucerini.
- *Melitoma* Berthold, 1827:468, nomen nudum, Latinization of *Melitome* Latreille. **Emphorini**?
- Melitoma Lepeletier and Serville, 1828:529. Type species: Melitoma euglossoides Lepeletier and Serville, 1828, monobasic. Isotypic with Meliphila by synonymy. Emphorini.
- *Melitome* Latreille, 1825:464, nomen nudum, French vernacular. Emphorini?
- Melitribus Rayment, 1930a:217. Type species: Melitribus greavesi Rayment, 1930, by original designation. Rayment, 1930b:61, subsequently designated Gastropsis victoriae Cockerell, 1906, as the type species. Stenotritidae.
- *Melitta* Kirby, 1802:117. Type species: *Melitta tricincta* Kirby, 1802, by designation of Richards, 1935:172. Isotypic with *Kirbya*. **Melittinae**.
- *Melittidia* Dalla Torre, 1896:99, lapsus for *Mellitidia* Guérin-Méneville, 1830. **Nomiinae.**
- *Melittoides* Friese, 1921a:177. Type species: *Andrena melittoides* Friese, 1899, by absolute tautonymy. **Andreninae.**
- Melittosmithia Schulz, 1906:244, replacement for Smithia Vachal, 1897. Type species: Scrapter carinata Smith, 1862, by designation of Cockerell, 1910b:358. Euryglossinae.
- Melittoxena Morawitz, 1873b:154. Type species: Nomada truncata Nylander, 1848, monobasic. Biastini.
- *Melitturga* Latreille, 1809:176. Type species: *Eucera clavicornis* Latreille, 1806, monobasic. **Panurginae.**

- Meliturga Lepeletier and Serville, 1828:799, unjustified emendation of Melitturga Latreille, 1809. Panurginae.
- Meliturgopsis Ashmead, 1899a:62, no included species; Cockerell, 1909c (May 13):414, included a species. Type species: Emphoropsis murihirta murina Cockerell, 1909, first included species, designated by Sandhouse, 1943:572. The inclusion and designation of Anthophora aurulento-caudata Dours, 1869, by Vachal, 1909b:9, was published in July and is junior to Cockerell (1909c). Anthophorini.
- *Meliturgula* Friese, 1903b:33. Type species: *Meliturgula braunsi* Friese, 1903, monobasic. **Panurginae.**
- Meliwillea Roubik, Segura, and Camargo, 1997:102. Type species: Meliwillea bivea Roubik, Segura, and Camargo, 1997, by original designation. Meliponini.
- Mellitidia Guérin-Méneville, 1830:270. Type species: Andrena australis Guérin-Méneville, 1830, monobasic. Nomiinae.
- Melliturga Latreille, 1809:177, lapsus for Melitturga Latreille, 1809. Panurginae.
- Mendacibombus Skorikov, 1914a:125. Type species: Bombus mendax Gerstaecker, 1869, by designation of Sandhouse, 1943:572. [Bombus]. Bombini.
- Mermiglossa Friese, 1912:188. Type species: Mermiglossa rufa Friese, 1912, monobasic. Panurginae.
- Meroglossa Smith, 1853:33. Type species: Meroglossa canaliculata Smith, 1853, monobasic. Hylaeinae.
- Meroglossula Perkins, 1912;99. Type species: Meroglossa eucalypti Cockerell, 1910, monobasic. [Meroglossa]. Hylaeinae.
- *Merrophites* Warncke, 1979:133. Type species: *Dufourea merceti* Vachal, 1907, by original designation. [Rophites]. **Rophitinae.**
- Mesanthidiellum Pasteels, 1969a:83. Type species: Mesanthidiellum amoenum Pasteels, 1969, by original designation. Anthidiini.
- Mesanthidium Popov, 1950a:316. Type species: Anthidium pentagonum Gussakovskij, 1930, by original designation. Anthidiini.
- Mesocheira Lepeletier and Serville, 1825:106. Type species: Melecta bicolor Fabricius, 1804, by designation of Taschenberg, 1883:72. Ericrocidini.
- Mesochira Agassiz, 1846:20; Schulz, 1906:257, unjustified emendation of Mesocheira Lepeletier and Serville, 1825. Ericrocidini.
- Mesonychium Lepeletier and Serville, 1825:107. Type species: Mesonychium coerulescens Lepeletier and Serville, 1825. monobasic. Ericrocidini.
- Mesoplia Lepeletier, 1841:457. Type species: Mesocheira azurea Lepeletier and Serville, 1825, monobasic. Isotypic with Melissa. Ericrocidini.
- Mesotrichia Westwood, 1838:112. Type species: Mesotrichia torrida Westwood, 1838, monobasic. **Xylocopini.**
- Mesoxaea Hurd and Linsley, 1976:41. Type species: Oxaea nigerrima Friese, 1912, by original designation. Oxaeinae.
- Metadioxys Popov, 1947:88. Type species: Dioxys formosa Morawitz, 1875, by original designation. Dioxyini.

- Metallinella Tkalců, 1966:200. Type species: Osmia atrocaerulea Schilling, 1849 = Eucera brevicornis Fabricius, 1798, by original designation. Osmini.
- Metamegachile Tkalců, 1967:102. Type species: Anthophora albisecta Klug, 1817, by original designation. [Megachile]. Megachilini.
- Metapsaenythia Timberlake, 1969:89. Type species: Calliopsis abdominalis Cresson, 1878, by original designation. Panurginae.
- Metapsithyrus Popov, 1931a:135. Type species: Apis campestris Panzer, 1801, by original designation. [Psithyrus]. Bombini.
- Metasamba Michener, 1981:69. Type species: Haplomelitta fasciata Michener, 1981, by original designation. [Haplomelitta]. Dasypodinae.
- Metatrachusa Pasteels, 1969a:22. Type species: Anthidium pendleburyi Cockerell, 1927, by original designation. [Trachusa]. Anthidiini.
- Metylaeus Bridwell, 1919:126, 131. Type species: Metylaeus cribratus Bridwell, 1919, by original designation. Hylaeinae.
- Metziella Michener, 1942:273. Type species: Prosopis potens Metz, 1911 = Prosopis sparsa Cresson, 1869, by original designation. [Hylaeus]. Hylaeinae.
- Mexalictus Eickwort, 1978:567. Type species: Mexalictus micheneri Eickwort, 1978, by original designation. Halictini.
- Michanthidium Urban, 1994a:281, replacement for Gnathanthidium Urban. Type species: Gnathanthidium sakagamii Urban, autobasic. Anthidiini.
- Michenerapis Hirashima and Lieftinck, 1982:5. Type species: Palaeorhiza bicolor Hirashima and Lieftinck, 1982, by original designation. [Palaeorhiza]. **Hylaeinae.**
- Michenerella Krombein, 1950:122. Type species: Heriades paganensis Yasumatsu, 1942, by original designation. [Heriades]. Osmiini.
- *Micheneria* Kerr, Pisani, and Aily, 1967:139, not Orfila and Rossi, 1956. Type species: *Melipona scutellaris* Latreille, 1811, by original designation. [Melipona]. See *Michmelia*, **Meliponini**.
- Michenerula Bohart, 1965;320. Type species: Michenerula beameri Bohart, 1965, by original designation. Rophitinae.
- Michmelia Moure, 1975:621, replacement for Micheneria Kerr, Pisani, and Aily. Type species: Melipona scutellaris Latreille, 1811, autobasic. [Melipona]. Meliponini.
- Micralictoides Timberlake, 1939:397. Type species: Halictoides ruficaudus Michener, 1937, by original designation. [Dufourea]. Rophitinae.
- Micramegilla Brooks, 1988:508. Type species: Anthophora niveata Friese, 1905, by original designation. [Amegilla]. Anthophorini.
- Micrandrena Ashmead, 1899a:89. Type species: Micrandrena pacifica Ashmead, 1899 = Andrena melanochroa Cockerell, 1898, by original designation. Andreninae.
- Micranthidium Cockerell, 1930b:45. Type species: Anthidium truncatum Smith, 1854, by original designation. [Pachyanthidium]. Anthidiini.

- Micranthophora Cockerell, 1906d:66. Type species: Anthophora curta Provancher, 1895, by original designation. Anthophorini.
- *Micrapis* Ashmead, 1904a:122. Type species: *Apis florea* Fabricius, 1787, by original designation. **Apini.**
- Micraugochlora Schrottky, 1909b:483, no included species; Schrottky, 1909a:138, included one species. Type species: Micraugochlora sphaerocephala Schrottky, 1909, first included species. Isotypic with Temnosomula by synonymy. Augochlorini.
- Micreriades Mavromoustakis, 1958:444. Type species: Heriades parnesica Mavromoustakis, 1958, by original designation. [Heriades]. Osmiini.
- Microcolletes Michener, 1965a:55. Type species: Paracolletes halictiformis Cockerell, 1916 (not Euryglossa halictiformis Smith, 1879, homonym in Leioproctus) = Leioproctus halictomimus Michener, 1965 = Paracolletes minutus Cockerell, 1916, by original designation. [Leioproctus]. Colletinae.
- Microdontura Cockerell, 1929b:322. Type species: Microdontura mellea Cockerell, 1929, monobasic. Euryglossinae.
- Microhalictus Warncke, 1975b:85. Type species: Melitta minutissima Kirby, 1802, by original designation. [Halictus]. Halictini.
- Microhesma Michener, 1965a:113. Type species: Brachyhesma incompleta Michener, 1965, by original designation. [Brachyhesma]. Euryglossinae.
- Microhoplitis Tkalců, 1993b:811. Type species: Osmia hohmanni Tkalců, 1993, by original designation. [Osmia]. Osmiini,
- Micromelecta Baker, 1906:143. Type species: Melecta maculata Cresson, 1879, by original designation. Isotypic with Zacosmia. Melectini.
- Micrommation Moure, 1969:247. Type species: Micrommation larocai Moure, 1969, by original designation. Augochlorini.
- Micronomada Cockerell and Atkins, 1902:44. Type species: Nomada modesta Cresson, 1863, by original designation. [Nomada]. Nomadini.
- Micronomadopsis Rozen, 1958:107. Type species: Nomadopsis fracta Rozen, 1958, by original designation. [Nomadopsis]. Panurginae.
- Micronychapis Moure and Michener. 1955b:286. Type species: Tetralonia duckei Friese, 1908, by original designation. Eucerini.
- Micropasites Linsley, 1942:130. Type species: Neopasites cressoni Crawford, 1916, by original designation. [Gnathopasites]. Biastini.
- Micropasites Warncke, 1983:283, not Linsley, 1942. Type species: Animobates minutissimus Mavromoustakis, 1959, renamed tunensis Warncke, 1983, because of homonymy in Pasites. [Pasites]. See Ebmeriana. Ammobatini.
- Microrophites Warncke, 1979:133. Type species: Rophites quadridentatus Warncke, 1979, by original designation. [Rophites]. Rophitinae.

- Microsphecodes Eickwort and Stage, 1972:501. Type species: Sphecodes kathleenae Eickwort, 1972, by original designation. [Sphecodes]. Halictini.
- Microstelis Robertson, 1903a:170, 175. Type species: Stelis lateralis Cresson, 1864, by original designation. Anthidiini.
- Microthurge Michener, 1983:181. Type species: Lithurgus pharcidontus Moure, 1948, by original designation. Lithurgini.
- Mielkeanthidium Urban, 1996:121. Type species: Mielkeanthidium nigripes Urban, 1996, by original designation. Anthidiini.
- Mimandrena Lanham, 1949:217. Type species: Andrena imitatrix Cresson, 1872, by original designation. [Andrena]. Andreninae.
- Mimoxylocopa Hurd and Moure, 1963:203. Type species: Xylocopa rufipes Smith, 1852, by original designation. [Xylocopa]. Xylocopini.
- Mimulapis Bridwell, 1919:162. Type species: Mimulapis versatilis Bridwell, 1919, by original designation. Rophitinae.
- Minutodufourea Ebmer, 1984:361. Type species: Dufourea minutissima Ebmer, 1976, by original designation. [Dufourea]. **Rophitinae.**
- Mitchellapis Michener, 1965a:211. Type species: Megachile fabricator Smith, 1868, by original designation. [Megachile]. Megachilini.
- Mitsukuriapis Hirashima, LaBerge, and Ikudome, in Ikudome, 1994:6, replacement for Mitsukuriella Hirashima and LaBerge. Type species: Nomia japonica Smith, 1873, autobasic. [Andrena]. Andreninae.
- Mitsukuriella Hirashima and LaBerge, 1965, in Hirashima, 1965a:472, not Heding and Panning, 1954. Type species: Nomia japonica Smith, 1873, by original designation. [Andrena]. See Mitsukuriapis. Andreninae.
- Monia Westwood, 1875:221, not Gray, 1850. Type species: Monia grisea Westwood, 1875, monobasic. See Monidia. Colletinae.
- Monidia Cockerell, 1905c:9, replacement for Monia Westwood, 1875. Type species: Monia grisea Westwood, 1875, autobasic. Colletinae
- Monilapis Cockerell, 1931f:529. Type species: Hylaeus tomentosus Eversmann, 1852, by original designation. [Halictus]. Halictini.
- Monilosmia Robertson, 1903a:166, 171. Type species: Osmia canadensis Cresson, 1864 = Osmia simillima Smith, 1853, by original designation. **Osmiini**.
- Monoeca Lepeletier and Serville, 1828:528. Type species: Monoeca brasiliensis Lepeletier and Serville, 1828, monobasic. **Tapinotaspidini.**
- Monoepeolus Bischff, 1930:3. Type species: Apis variegata Linnaeus, by original designation. Named in synonymy of Epeolus s. str. as contrast to Diepeolus. [Epeolus]. Isotypic with Epeolus. Epeolini.

- *Monosmia* Tkale, 1974a:337. Type species: *Osmia apicata* Smith, by original designation. [Osmia]. **Osmiini.**
- Monoxylocopa Hurd and Moure, 1963:127. Type species: Xylocopa abbreviata Hurd and Moure, 1963, by original designation. [Xylocopa]. Xylocopini.
- Monumetha Cresson, 1864:387. Type species: Chelostoma albifrons Kirby, 1837, by designation of Titus, 1904a:26. Osmiini.
- Morawitzella Popov, 1957:916. Type species: Epimethea nana Morawitz, 1880, by original designation. Rophitinae.
- Morawitzia Friese, 1902:185. Type species: Morawitzia panurgoides Friese, 1902, by designation of Sandhouse, 1943:574. Sandhouse (1943) considered this genus monobasic, but two names (one called a variety) were included by Friese (1902). Rophitinae.
- Morgania Smith, 1854:253. Type species: Pasites dichroa Smith, 1854, monobasic. Ammobatini.
- Morphanthidium Pasteels, 1969b:423. Invalid because no type species designated; three included species. Synonym of Ardenthidium, to judge by two of the included species, and was presumably intended by Pasteels to be the same as Ardenthidium. [Anthidium]. Anthidiini.
- Morphella Pasteels, 1965:537. Type species: Megachile biseta Vachal, 1903, by original designation. [Chalicodoma]. Megachilini.
- Moureana Mitchell, 1980:56. Type species: Megachile anthidioides Radoszkowski, 1874, by original designation. [Pseudocentron]. Megachilini.
- Moureanthidium Urban, 1995a:37. Type species: Dianthidium subarenarium Schwarz, 1933, by original designation.

 Anthidiini.
- Mourecotelles Toro and Cabezas, 1977:50. Type species: Mourecotelles mixta Toro and Cabezas, 1977, by original designation. Colletinae.
- Mourella Schwarz, 1946, in Moure, 1946a:442. Type species: Melipona caerulea Friese, 1900, by original designation. Meliponini.
- Mucidobombus Krüger, 1920:350. Type species: Bombus mucidus Gerstaecher, 1869, monobasic. Krüger gave no subgeneric characters, but according to the Code, 3rd ed., Art. 12(b)(5), the name is nonetheless valid. Isotypic with Mucidobombus Skorikov. Bombini.
- Mucidobombus Skorikov, 1922b:149. Type species: Bombus mucidus Gerstaecker, 1869, by designation of Sandhouse, 1943:574. Homonym and junior synonym of and isotypic with Mucidobombus Krüger, 1920. Bombini.
- Mycterochlora Eickwort, 1969:423. Type species: Halictus repandirostris Vachal, 1911, by original designation. [Augochlora]. Augochlorini.
- Mydrosoma Smith, 1879:5. Type species: Mydrosoma metallicum Smith. 1879 = Apista opalina Smith, 1861, monobasic. Dissoglottini.

- Mydrosomella Michener, 1986b:194. Type species: Diphaglossa (?) gaullei Vachal, 1904, by original designation. Dissoglottini.
- Mystacanthophora Brooks, 1988:466. Type species: Anthophora montana Cresson, 1869, by original designation. [Anthophora]. Anthophorini.
- Mystacosmia Snelling, 1967:104. Type species: Osmia nemoris Sandhouse, 1924, by original designation. [Osmia]. Osmiini.
- Nananthidium Moure, 1947a:26. Type species: Nananthidium bettyae Moure, 1947, by original designation. Anthidiini.
- Nannotrigona Cockerell, 1922e:9. Type species: Melipona testaceicornis Lepeletier, 1836, by original designation. Meliponini.
- Nanocolletes Warncke, 1978:341. Type species: Colletes nanus Friese, 1898, by original designation. [Colletes]. Colletinae.
- Nanoxylocopa Hurd and Moure, 1963:99. Type species: *Xylocopa ciliata* Burmeister, 1876, by original designation. [Xylocopa]. **Xylocopini.**
- Nasutapis Michener, 1970:208. Type species: Nasutapis straussorum Michener, 1970, by original designation. Allodapini.
- *Navicularia* Méhelÿ, 1935:34, 140. Invalid because no type species was designated. [Prosopis]. **Hylaeinae**.
- Navicularia Popov, 1939:168. Type species: Mellinus variegatus Fabricius, 1798, by original designation. [Prosopis]. **Hylaeinae.**
- Neagapostemon Cure, 1989:295. Type species: Pseudagapostemon cyanomelas Cure, 1989, by original designation. Cure (1989) attributes the specific name cyanomelas to Moure, but earlier usages were nomina nuda; Cure was the first to describe the species. [Pseudagapostemon]. Halictini.
- *Nealictus* Pesenko, 1984:346. Type species: *Halictus parallelus* Say, 1837, by original designation. [Halictus]. **Halictini.**
- Neanthidium Pasteels, 1969a:93. Type species: Anthidium octodentatum Pérez, 1895, by original designation. Anthidiini.
- Nectarodiaeta Holmberg, 1887b:225, nomen nudum. Eucerini.
- Nectarodiaeta Holmberg, 1903:420. Type species: Nectarodiaeta oliveirae Holmberg, 1903, monobasic. Eucerini.
- Neffapis Ruz, 1995, in Rozen and Ruz, 1995:3. Type species: Neffapis longilingua Ruz, 1995, by original designation. Panurginae.
- Neglectella Pasteels, 1965:431. Type species: Megachile armatipes Friese, 1909, by original designation. [Chalicodoma]. Megachilini.
- Nemandrena LaBerge, 1971a:48. Type species: Andrena torulosa LaBerge, 1971, by original designation. [Andrena]. Andreninae.
- Neoashmeadiella Gupta, 1990:56. Type species: Ashmeadiella indica Gupta, 1990, by original designation. [Ashmeadiella]. Megachilini.
- Neoceratina Perkins, 1912:117. Type species: Neoceratina australensis Perkins, 1912, monobasic. Ceratinini.

- Neochalicodoma Pasteels, 1970:231. Type species: Chalicodoma pseudolaminata Pasteels, 1965, by original designation. [Chalicodoma]. Megachilini.
- Neochelynia Schrottky, 1920:187. Type species: Neochelynia paulista Schrottky, 1920, monobasic. Megachilini.
- Neocoelioxys Mitchell, 1973:64. Type species: Coelioxys assumptionis Schrottky, 1911, by original designation. [Coelioxys]. Megachilini.
- Neocorynura Schrottky, 1910:540, replacement for Cacosoma Smith, 1879. Type species: Cacosoma discolor Smith, antobasic. Augochlorini.
- Neocorynuroides Eickwort, 1969:404. Type species: Halictus rhytis Vachal, 1904, by original designation. [Neocorynura]. Augochlorini.
- Neocressoniella Gupta, 1993:172. Type species: Megachile carbonaria Smith, 1853, by original designation. [Cressoniella]. Megachilini.
- Neoeutricharaea Rebmann, 1967:36. Type species: Apis rotundata Fabricius, 1787, by original designation. [Megachile]. Megachilini.
- Neofidelia Moure and Michener, 1955a:202. Type species: Neofidelia profuga Moure and Michener, 1955, by original designation. **Fideliini.**
- Neohalictoides Viereck, 1904b:261. Type species: Panurgus maurus Cresson, 1878, by original designation. Rophitinae
- Neolarra Ashmead, 1890:8. Type species: Neolarra pruinosa Ashmead, 1890, monobasic. Neolarrini.
- Neoliphanthus Ruz and Toro, 1983:274. Type species: Liphanthus bicellularis Ruz and Toro, 1983, by original designation. [Liphanthus]. Panurginae.
- Neomegachile Mitchell, 1934:302, 306. Type species: Megachile chichimeca Cresson, 1878, by original designation. [Megachile]. Megachilini.
- Neopanurgus Schwammberger, 1971:2. Type species: Neopanurgus richteri Schwammberger, 1971, by original designation. **Panurginae.**
- Neopasiphae Perkins, 1912:114. Type species: Neopasiphae mirabilis Perkins, 1912, monobasic. Colletinae.
- Neopasites Ashmead, 1898:284. Type species: *Phileremus fulviventris* Cresson, 1878, by original designation. Isotypic with *Gnathopasites*. **Biastini.**
- Neoperdita Ashmead, 1899a:85. Type species: Perdita zebrata Cresson, 1878, by original designation. Panurginae.
- Neoscirtetica Schrottky, 1913:256, replacement for Scirtetica Holmberg, 1903. Type species: Scirtetica antarctica Holmberg, 1903, autobasic. Isotypic with Alloscirtetica and Holmbergiapis. Eucerini.
- Neosmia Tkalců, 1974a:333. Type species: Osmia gracilicornis Pérez, by original designation. [Osmia]. **Osmiini.**
- Neotrypetes Robertson, 1918a:91. Type species: Trypetes productus Robertson, 1905 = Megachile variolosa Cresson, 1872, by original designation. **Osmiini.**

- Neoxylocopa Michener, 1954:157. Type species: Apis brasilianorum Linnaeus, 1767, by original designation. [Xylocopa]. **Xylocopini.**
- Neshylaeus Heider, 1935:2245, unjustified emendation of Nesylaeus Bridwell, 1919. Hylaeinae.
- Nesocolletes Michener, 1965a:52. Type species: Lamprocolletes fulvescens Smith, 1876, by original designation. [Leioproctus]. Colletinae.
- Nesoeupetersia Blüthgen, 1936:182. Type species: Sphecodes scotti Cockerell, 1912, by original designation. [Eupetersia]. Halictini.
- Nesohalictus Crawford, 1910:120. Type species: Halictus robbii Crawford, 1910 = Nomia halictoides Smith, 1858, by original designation. [Halictus]. Halictini.
- Nesohylaeus Ikudome, 1989:125. Type species: Hylaeus niger Bridwell, 1919, by original designation. [Hylaeus]. Hylaeinae.
- Nesomelecta Michener, 1948b:15. Type species: Melecta haitensis Michener, 1948, by original designation. [Melecta]. Melectini.
- Nesomonia Michener, Brooks, and Pauly, 1990:135. Type species: Nomia flaviventris Benoist, 1963, by original designation. [Uromonia]. Meganomiinae.
- *Nesoprosopis* Perkins, 1899:75. Type species: *Prosopis facilis* Smith, 1879, by designation of Popov, 1939:168. **Hylaeinae.**
- Nesothrincostoma Blüthgen, 1933:364. Type species: Thrincostoma serricorne Blüthgen, 1933, monobasic. Halictini.
- Nesylaeus Bridwell, 1919:147. Type species: Hylaeus nesoprosopoides Bridwell, 1919, by original designation. [Hylaeus]. Hylaeinae.
- Nevadensibombus Skorikov, 1922b:149. Type species: Bombus nevadensis Cresson, 1874, by designation of Frison, 1927:64. **Bombini.**
- Nigranthidium Pasteels, 1984:57, replacement for Melanthidium Pasteels, 1969. Type species: Anthidium concolor Friese, 1913, by original designation and autobasic. Anthidiini.
- Nigrocoelioxys Gupta, 1993:235. Type species: Coelioxys fuscipennis Smith, 1854, by original designation. [Coelioxys]. Megachilini.
- Niltonia Moure, 1964c:52. Type species: Niltonia virgilii Moure, 1964, by original designation. Colletinae.
- Nitocris Rafinesque, 1815:123, unjustified replacement for Nomia Latreille, 1804. Type species: Andrena curvipes Fabricius, 1781, autobasic. Nomiinae.
- Nivanthidium Pasteels, 1969a:106. Type species: Anthidium niveocinctum Gerstaecker, 1857, by original designation. [Anthidium]. Anthidiini.
- Nobandrena Warncke, 1968:45. Type species: Andrena nobilis Morawitz, 1874, by original designation. [Andrena]. Andreninae,
- Nobilibombus Skorikov, 1933a:62. Invalid because no type species was designated [Code, 3rd ed., Art. 13(b)]. Bischoff,

- 1936:12, and Milliron. 1961:54, designated type species but placed *Nobilibombus* as a junior synonym of other names, and thus did not validate it (see Williams, 1991). **Bombini.**
- Nobilibombus Richards, 1968:216, 222. Type species: Bombus nobilis Friese, 1904, by original designation. [Bombus]. Bombini.
- Nodocolletes Rayment, 1931:164. Type species: Nodocolletes dentatus Rayment, 1931 = Andrena chalybeata Erichson, 1851, by original designation. Isotypic with Lamprocolletes by synonymy. Colletinae.
- Nodula Ma, 1938:290. Type species: Apis amethystina Fabricius, 1793, by original designation. [Xylocopa]. **Xylocopini.**
- Nogueirapis Moure, 1953b:247. Type species: Trigona butteli Friese, 1900, by original designation. [Partamona]. Meliponini.
- Nomada Scopoli, 1770:44. Type species: Apis ruficornis Linnaeus, 1758, by designation of Curtis, 1832:pl. 419. Apis fabriciana Linnaeus, 1767, designated by Latreille, 1810:439, was not originally included. Nomada succincta Panzer, 1798, was designated as the type species by Blanchard, 1849:pl. 128 (1847) but was not originally included. Nomadini.
- Nomadita Mocsáry, 1894:37. Type species: Nomadita montana Mocsáry, 1894, monobasic. **Nomadini.**
- Nomadopsis Ashmead, 1898:285. Type species: Perdita zonalis Cresson, 1879, lapsus for Calliopsis zonalis Cresson, 1879, by original designation. Isotypic with Claremontiella by synonymy. Panurginae.
- Nomadosoma Rohwer, 1911:24. Type species: Pasites pilipes Cresson, 1865, by original designation. Nomadini.
- Nomadula Cockerell, 1903d:611. Type species: Nomada americana Kirby of Robertson, 1903d = Nomada articulata Smith, 1854, by original designation. See Code, ed. 3, Art. 70(c). [Nomada]. Nomadini.
- Nomia Latreille, 1804:182. Type species: Andrena curvipes Fabricius, 1781, monobasic. Nomia diversipes "Fabr.," actually Latreille, 1806, designated by Blanchard, 1849:pl. 125 (1847), was not originally included. Nominae.
- Nomiapis Cockerell, 1919a:208. Type species: Nomia diversipes Latreille, 1806, by original designation. [Nomia]. Nominae.
- Nomiocolletes Brèthes, 1909c:455. Type species: Nomia joergenseni Friese, 1908, by original designation. Colletinae.
- Nomioides Schenck, 1866:333. Type species: Apis minutissima Rossi, 1790, designated by the Commission, Opinion 1319 (1985). Misidentification of the type species as Andrena pulchella Jurine, 1807, by Schenck and associated nomenclatural problems are explained by Pesenko and Kerzhner (1981). Nomioidinae.
- Noonadania Hirashima, 1978:68. Type species: Palaeorhiza sculpturalis Hirashima, 1978, by original designation. [Palaeorhiza]. Hylaeinae.
- Notandrena Pérez, 1890:173. Type species: Andrena nitidiuscula Schenck, 1853, designated by Hedicke, 1933:216. [Andrena]. Andreninae.

- Notanthidium Isensee, 1927:373. Type species: Anthidium steloides Spinola, 1851, by original designation. [Dianthidium]. Anthidiini.
- Noteopsis Ikudome, 1991:791. Type species: Hylaeus nanseiensis Ikudome, 1989, by original designation. [Hylaeus]. Hylaeinae.
- Noteriades Cockerell, 1931b:332. Type species: Megachile tricarinata Bingham, 1903, by original designation. [Heriades]. Osmiini.
- Nothosmia Ashmead, 1899a:75. Type species: Osmia distincta Cresson, 1864, by original designation. Osmiini.
- Nothylaeus Bridwell, 1919:125, 126. Type species: *Prosopis heraldica* Smith, 1853, by original designation. **Hylaeinae.**
- Notocolletes Cockerell, 1916b:44. Type species: Notocolletes heterodoxus Cockerell, 1916, monobasic. Colletinae.
- Notolonia Popov, 1962:294. Type species: Notolonia astragali Popov, 1962, by original designation. Eucerini.
- Notomegilla Brooks, 1988:511. Type species: Anthophora aeruginosa Smith, 1854, by original designation. [Amegilla]. Anthophorini.
- Notomelitta Cockerell, 1933b:128. Type species: Rediviva neliana Cockerell, 1931, by original designation. Melittinae.
- Notoxaea Hurd and Linsley, 1976:21. Type species: Oxaea ferruginea Friese, 1898, by original designation. Oxaeinae.
- Notoxylocopa Hurd, 1956:2. Type species: Xylocopa tabaniformis Smith, 1854, by original designation. [Xylocopa]. Xylocopini.
- Nubenomia Pauly, 1980:122. Type species: Nomia nubecula Smith, 1875, by original designation. [Nomia]. Nomiinae.
- Nyctomelitta Cockerell, 1929e:303. Type species: Bombus tranquebaricus Fabricius, 1804, by original designation. [Xylocopa]. Xylocopini.
- Obertobombus Reinig, 1930:107. Type species: Bombus oberti Morawitz, 1883, monobasic. [Bombus]. Bombini.
- Ochreriades Mavromoustakis, 1956:226. Type species: Eriades fasciatus Friese, 1899, by original designation. Osmiini.
- *Odontalictus* Robertson, 1918a:91. Type species: *Halictus ligatus* Say, 1837, by original designation. **Halictini.**
- Odontanthocopa Tkalců, 1974b:125. Type species: Osmia bidentata Morawitz, 1876, by original designation. [Anthocopa]. Osmiini,
- Odonterythrosmia Tkalců, 1974b:131. Type species: Osmia fallax Pérez, 1895, by original designation. [Anthocopa]. Osmiini.
- Odontobombus Krüger, 1917:61. Type species: Apis argillacea Scopoli, 1763, by designation of Williams, 1994:339. A sectional name, to be treated as a subgenus according to the Code, 3rd ed., Art. 10(e). [Bombus]. Isotypic with Megabombus by synonymy. Bombini.
- Odontochlora Schrottky, 1909a:141. Type species: Augochlora mulleri Cockerell, 1900, by original designation. Augochlorini.

- Odontopasites Linsley, 1942:128. Type species: Neopasites arizonicus Linsley, 1942, by original designation. [Neopasites]. Ammobatoidini.
- Odontostelis Cockerell, 1931d:542. Type species: Stelis abnormis Friese, 1925 = Anthidium bivittatum Cresson, 1878, by original designation. Isotypic with Hoplostelis. Anthidiini.
- Odontotrigona Moure, 1961:213. Type species: Trigona haematoptera Cockerell, 1919, by original designation. Meliponini.
- Odyneropsis Schrottky, 1902a:432. Type species: Odyneropsis holosericea Schrottky, 1902, by original designation. **Epeolini.**
- Oediscelis Philippi, 1866: 109. Type species: Oediscelis vernalis Philippi, 1866, by designation of Cockerell, 1919a:185. Toro and Moldenke (1979) erroneously list the type species as O. pleheia Philippi. Xeromelissinae.
- Oediscelisca Moure, 1946c:243. Type species: Oediscelis friesei Ducke, 1907, by original designation. **Xeromelissinae.**
- Oestropsis Smith, 1868a:253, not Brauer, 1868. Type species: Oestropsis pubescens Smith, 1868, monobasic. See Gastropis. Stenotritidae.
- Oligandrena Lanham, 1949:207. Type species: Andrena macrocephala Cockerell, 1916, by original designation. [Andrena]. Andreninae.
- Oligeucera Sitdikov and Pesenko, 1988:83. Type species: Eucera popovi Sitdikov, 1988, by original designation. [Eucera]. Eucerini.
- Oligochlora Engel, 1997:336. Type species: Oligochlora eickworti Engel, 1997, by original designation. Fossil, Augochlorini.
- Oligotropus Robertson, 1903a:168. Type species: Oligotropus campanulae Robertson, 1903, monobasic. Megachilini.
- Olmecanthidium Peters, 1972:377. Type species: *Ulanthidium interdisciplinaris* Peters, 1972, by original designation. [Ulanthidium]. **Anthidiini**.
- Omachtes Friese, 1909a:436, unjustified emendation of Omachthes Gerstaecker, 1869. Ammobatini.
- Omachthes Gerstaecker, 1869:154. Type species: Omachthes carnifex Gerstaecker, 1869, designated by Sandhouse, 1943:580. Ammobatini.
- Onagrandrena Linsley and MacSwain, 1956:111. Type species: Andrena oenotherae Timberlake, 1937, by original designation. [Andrena]. Andreninae.
- Opacula Pesenko and Sitdikov, 1988:849. Type species: Opacula donatica Sitdikov, 1988, by original designation. Eucerini.
- Opandrena Robertson, 1902a:187, 193. Type species: Andrena cressonii Robertson, 1871, by original designation. Andreninae.
- Oragapostemon Cure, 1989:312. Type species: Halictus divaricatus Vachal, 1903, by original designation. Halictini.
- Orandrena Warncke, 1968:36. Type species: Andrena oralis Morawitz, 1876, by original designation. [Andrena]. Andreninae.

- Oranthidium Pasteels, 1969a:95. Type species: Anthidium oraniense Brauns, 1905 = Anthidium folliculosum Buysson, 1897, by original designation. Anthidiini.
- Orbitella Ma. 1938:305, not Douville, 1915. Type species: *Xylocopa confusa* Pérez. 1901, by original designation. See *Maiella* and *Euryapis*. [Xylocopa]. **Xylocopini.**
- Oreomelissa Hirashima and Tadauchi, 1975:176. Type species: Andrena mitakensis Hirashima, 1963, by original designation. [Andrena]. Andreninae.
- Oreopasites Cockerell, 1906e:442. Type species: Oreopasites scituli Cockerell, 1906, monobasic. Ammobatini.
- Orfilana Moure, 1954b:266. Type species: Doeringiella variegata Holmberg, 1886, by original designation. [Doeringiella]. Epeolini.
- Orientalibombus Richards, 1929:378. Type species: Bombus orientalis Smith. 1854. by original designation. [Bombus]. Bombini.
- Orientalobombus Krüseman, 1952:102, unjustified emendation of Orientalibombus Richards, 1929. [Bombus]. Bombini.
- Orientocoelioxys Gupta, 1992:73. Type species: Coelioxys quadrifasciatus Gupta, 1992, by original designation. [Coelioxys]. Megachilini.
- Orientocressoniella Gupta, 1993:165. Type species: Megachile relata Smith, 1879, by original designation. [Cressoniella]. Megachilini.
- Orientoheriades Gupta, 1987:68. Type species: Heriades orientalis Gupta, 1987, by original designation. [Heriades]. Osmiini.
- Orientosmia Peters, 1978b:332. Type species: Osmia maxillaris Morawitz, 1875, by original designation. [Osmia]. Osmiini.
- Orientotrachusa Gupta, 1993:50. Type species: Anthidium orientale Bingham, 1897, by original designation. [Trachusa]. Anthidiini.
- Orphana Vachal, 1909a:35, 38. Type species: Orphana inquirenda Vachal, 1909, monobasic. Isotypic with Leptoglossa and Ptoleglossa by synonymy. Andreninae.
- Orthanthidium Mavromoustakis, 1953:837. Type species: Anthidium formosanum Friese, 1917, by original designation. [Paraanthidium]. Anthidiini.
- Osirinus Roig-Alsina, 1989:17. Type species: Osirinus lemniscatus Roig-Alsina, 1989, by original designation. Isotypic with Compsoclepta by synonymy. Osirini.
- Osiris Smith, 1854:288. Type species: Osiris pallidus Smith, 1854, by designation of Sandhouse, 1943:580. Osirini.
- Osmia Panzer, 1806:230. Type species: Apis bicornis Linnaeus, 1758 = Apis rufa Linnaeus, 1758, by designation of Latreille, 1810:439. Osmia tricornis Latreille, 1811, designated by Blanchard, 1849:pl. 127 (1846), was not an originally included species. Isotypic with Amblys and Ceratosmia; isotypic with Pachyosmia by synonymy. Osmiini.
- Othinosmia Michener, 1943:86. Type species: Thaumatosoma moniliferum Cockerell, 1932, by original designation. [Anthocopa]. Osmiini.

- Oxaea Klug, 1807a:261. Type species: Oxaea flavescens Klug, monobasic. The names Oxaea and Dasyglossa appear to have been published at approximately the same time in late 1807. Dasyglossa has not been used since, and in 1810 was discussed under the heading of Oxaea (Klug, 1810). Even if Dasyglossa has priority, it should not be resurrected. Isotypic with Dasyglossa. Oxaeinae.
- Oxyandrena LaBerge, 1977:135. Type species: Andrena longifovea LaBerge, 1977, by original designation. [Andrena]. Andreninae.
- Oxyanthidium Mavromoustakis, 1963a:653. Type species: Anthidium aculeatum Klug, 1832, by original designation. [Meganthidium]. Anthidiini.
- Oxybiastes Mavromoustakis, 1954:260. Type species: Oxybiastes bischoffi Mavromoustakis, 1954, by original designation. Epeolini.
- Oxyhalictus Cockerell and Ireland, 1935, in Cockerell, 1935b:91. Type species: *Halictus acuiferus* Cockerell and Ireland, 1935, monobasic. [Halictus]. **Halictini**.
- Oxynedis Moure, 1946d:18, 27, 31, pl. 3, error for Oxynedys Schrottky, 1902. Ericrocidini.
- Oxynedys Schrottky, 1902a:491. Type species: Oxynedys beroni Schrottky, 1902 = Mesocheira velutina Lepeletier and Serville, 1825, by original designation. Isotypic with Hopliphora by synonymy. Ericrocidini.
- Oxystoglossa Smith, 1853:83. Type species: Oxystoglossa decorata Smith, 1853, monobasic. Augochlorini.
- Oxystoglossella Eickwort, 1969:422. Type species: Augochlora cordiaefloris Cockerell, 1907, by original designation. [Augochlora]. Augochlorini.
- Oxystoglossidia Moure, 1943b:473. Type species: Oxystoglossidia uraniella Moure, 1943, by original designation. Augochlorini.
- Oxytrigona Cockerell, 1917a:124. Type species: Trigona flaveola mediorufa Cockerell, 1913, by original designation. [Trigona]. Meliponini.
- Oxyxylocopa Hurd and Moure, 1963:275. Type species: Xylocopa varipes Smith, 1854, by original designation. [Xylocopa]. Xylocopini.
- Ozbekosmia Zanden, 1994:168. Type species: Osmia avosetta Warncke, 1988, by original designation. [Osmia]. Osmiini.
- Pachyanthidium Friese, 1905a:66. Type species: Anthidium bicolor Lepeletier, 1841, by designation of Cockerell, 1920b:298. Also described as new by Friese, 1910b:158. [Anthidium]. Anthidiini.
- Pachyceble Moure, 1940:54. Type species: Pachyceble lanei Moure, 1940, by original designation. Halictini.
- Pachycentris Friese, 1902:186. Type species: Pachycentris schrottkyi Friese, 1902, monobasic. **Tapinotaspidini**.
- Pachycerapis Cockerell, 1922d:4. Type species: Exomalopsis cornigera Cockerell, 1922, by original designation. [Exomalopsis]. Exomalopsini.

- Pachycolletes Bischoff, 1954, in Stoeckhert, 1954:73. Type species: Apis cunicularia Linnaeus, 1761, by original designation. [Colletes]. Colletinae.
- Pachyhalictus Cockerell, 1929d:589. Type species: Halictus merescens Cockerell, 1919, by original designation. [Halictus]. Halictini.
- Pachyhalonia Moure and Michener, 1955b:281. Type species: Dasyhalonia justi Moure and Michener, 1955 = Svastra sapucacensis Cockerell, 1918, by original designation. [Dasyhalonia]. Eucerini.
- Pachymelopsis Cockerell, 1905a:331. Type species: Pachymelus conspicuus Smith, 1879, by original designation. [Pachymelus]. Anthophorini.
- Pachymelus Smith, 1879:116. Type species: Pachymelus micrelephas Smith, 1879, by designation of Sandhouse, 1943:581. Sandhouse considered this species to be the type because the other species originally included had been removed to Pachymelopsis, but see Code, 3rd ed., Art. 69(b). Her conclusion is nonetheless accepted. Anthophorini.
- Pachynomada Rodeck, 1945:180. Type species: Nomada vincta Say, 1837, by original designation. [Nomada]. Nomadini.
- Pachynomia Pauly, 1980:124. Type species: Nomia amoenula Gerstaecker, 1870, by original designation. [Nomia]. Nominae.
- Pachyodonta Rayment, 1954:48. Type species: Binghamiella fulvicornis Rayment, 1954, monobasic. [Binghamiella]. Colletinae.
- Pachyosmia Ducke, 1900:18. Type species: Osmia rufa Linnaeus, 1758, designated by Sandhouse, 1939:9. [Osmia]. Isotypic with Osmia, Amblys, and Ceratosmia by synonymy. Osmiini.
- Pachyprosopina Michener, 1965a:108. Type species: Euryglossa paupercula Cockerell, 1915, by original designation. [Pachyprosopis]. Euryglossinae.
- Pachyprosopis Perkins, 1908:29. Type species: Pachyprosopis mirabilis Perkins, 1908, monobasic. Euryglossinae.
- Pachyprosopula Michener, 1965a:106. Type species: Pachyprosopis kellyi Cockerell, 1916, by original designation. [Pachyprosopis]. **Euryglossinae.**
- Pachysvastra Moure and Michener, 1955b:284. Type species: Tetralonia leucocephala Bertoni and Schrottky, 1910, by original designation. Eucerini.
- Paedia Dalla Torre, 1891:147, unjustified emendation of Paidia Radoszkowski, 1872. Ammobatoidini.
- Paidia Radoszkowski, 1872b:10, not Herrich-Schaffer, 1847, unnecessary replacement for Ammobatoides Radoszkowski, 1868. Type species: Phileremus abdominalis Eversmann, 1852, autobasic. Isotypic with Ammobatoides Radoszkowski and Phiarus. Ammobatoidini.
- Palaeapis Hong, 1984:37. Type species: Palaeapis beiboziensis Hong, 1984, monobasic. Fossil wasp, described in Apidae.
- Palaeorhiza Perkins, 1908:29. Type species: Prosopis perviridis Cockerell, 1905, by original designation. **Hylaeinae.**

- Palinepeolus Holmberg, 1909b:77. Type species: Epeolus viperinus Holmberg, 1886, by original designation. Isotypic with Calospiloma; isotypic with Isepeolus by synonymy. Isepeolini.
- Pallandrena Warncke, 1968:39. Type species: Andrena pallidicincta Brullé, 1832, by original designation. [Andrena]. Andreninae.
- Pallhalictus Warncke, 1975b:92. Type species: Halictus pallens Brullé, 1832, by original designation. [Halictus]. Halictini.
- Panomalopsis Timberlake, 1980:82. Type species: Exomalopsis linsleyi Timberlake, 1980, by original designation. [Exomalopsis]. Exomalopsini.
- Panurginus Nylander, 1848:223. Type species: Panurginus niger Nylander, 1848, monobasic. **Panurginae.**
- Panurgomia Viereck, 1909:48. Type species: Panurgomia fuchsi Viereck, 1909, monobasic. **Dasypodinae.**
- Panurgus Panzer, 1806:209. Type species: Andrena lobata Panzer, 1799 = Apis calcarata Scopoli, 1763, by designation of Latreille, 1810:439. Later and therefore invalid type designations were Apis ursina Gmelin, 1790, by Westwood, 1840a:85, and Apis atra Panzer, 1805 = Apis banksiana Kirby, 1802, by Blanchard, 1849:pl. 126 (1846). Isotypic with Eriops by synonymy. Panurginae.
- Papualictus Michener, 1980:8. Type species: Homalictus megalochilus Michener, 1980 = Halictus lorentzi Friese, 1911, by original designation. [Homalictus]. Halictini.
- Papuanorhiza Hirashima, 1996:80. Type species: Xenorhiza krombeini Hirashima, 1996, by original designation. [Xenorhiza]. Hylaeinae.
- Papuatrigona Michener and Sakagami, 1990, in Michener, 1990:153. Type species: *Trigona genalis* Friese, 1908, by original designation. [Trigona]. **Meliponini.**
- Paraanthidiellum Pasteels, 1969a:79, unnecessary emendation of Paranthidiellum Michener. [Pseudoanthidium]. Anthidiini.
- Paraanthidium Friese, 1898a:101. Type species: Apis interrupta Fabricius, 1781, by designation of Cockerell, 1909b: 269. [Anthidium]. Anthidiini.
- Paracella Pasteels, 1965:277, invalid because no type species was designated. [Megachile]. Megachilini.
- Paracella Michener, new subgenus of Megachile for Paracella Pasteels, 1965:277. Type species: Megachile semivenusta Cockerell, 1931. This taxon was characterized by Pasteels, 1965:227. Megachilini.
- Paracentris Cameron, 1903a:235. Type species: Paracentris fulvohirta Cameron, 1903, monobasic. Centridini.
- Parachalicodoma Pasteels. 1966:13, not Tkalců, 1969. Type species: Megachile incana Friese, by original designation. [Chalicodoma]. Megachilini.
- Parachalicodoma Tkalců, 1969b:363, not Pasteels, 1966. Type species: Chalicodoma rufitarsis Lepeletier, 1841, by original designation. See Xenochalicodoma. [Chalicodoma]. Megachilini.

- Paracoelioxys Gribodo, 1884:274. Type species: Coelioxys montandoni Gribodo, 1884 = Coelioxys alata Förster, 1853, monobasic. [Coelioxys]. Megachilini.
- Paracoelioxys Radoszkowski, 1893:53, not Gribodo, 1884. Type species: Paracoelioxys barrei Radoszkowski, 1893. by designation of Sandhouse. 1943:583. Coelioxys decipiens Spinola, 1838, designated by Alfken, 1938:433, was not an originally included species. See Radoszkowskiana. Megachilini.
- Paracolletes Smith, 1853:6. Type species: Paracolletes crassipes Smith, 1853, monobasic. Colletinae.
- Paracrocisa Alfken, 1937:173. Type species: Paracrocisa sinaitica Alfken, 1937, monobasic. Melectini.
- Paradialictus Pauly, 1984c:691. Type species: Paradialictus synavei Pauly, 1984, by original designation. Halictini.
- Paradioxys Mocsáry, 1894:35. Type species: Dioxys pannonica Mocsáry, 1877, monobasic. Dioxyini.
- Parafidelia Brauns, 1926:202. Type species: Parafidelia friesei Brauns, 1926, monobasic. Fideliini.
- Parafriesea Schrottky. 1906b:118, replacement for Friesea Schrottky, 1902. Type species: Friesea brasiliensis Schrottky, 1902 = Camptopoeum prinii Holmberg, 1884, autobasic.
 Panurginae.
- Paragapostemon Vachal, 1903:89. Type species: Halictus podager Vachal, 1903 = Nomia coelestina Westwood, 1875, by designation of Cockerell, 1905a:354 footnote. Halictini.
- Parahalictoides Cockerell and Porter, 1899:420. Type species: Halictoides campanulae Cockerell, 1897, by original designation. [Halictoides]. Rophitinae.
- Parahesma Michener, 1965a:92. Type species: Euryglossa tuberculipes Michener, 1965, by original designation. [Euryglossa]. Euryglossinae.
- Paraheterorhiza Hirashima, 1980:104. Type species: Palaeorhiza hilara Cheesman, 1948, by original designation. [Palaeorhiza]. **Hylaeinae.**
- Paralictus Robertson, 1901:229. Type species: Halictus cephalicus Robertson, 1892 (not Morawitz, 1873) = Halictus cephalotes Dalla Torre, 1896, by original designation. Halictini.
- Paramacropis Popov and Guiglia, 1936:287. Type species: Ctenoplectra ussuriana Popov, 1936, monobasic. [Macropis]. Melittinae.
- Paramegachile Friese, 1898b:198. Type species: Apis argentata Fabricius, 1793, by designation of Mitchell, 1934:298. [Megachile]. Isotypic with Eutricharaea. Megachilini.
- Paramegalochila Schulz, 1906:71. unjustified emendation of Paramegachile Friese, 1898. [Megachile]. Megachilini.
- Paramegilla Friese, 1897a:18, 24. Type species: Apis ireos Pallas, 1773, designated by Sandhouse, 1943:584. [Podalirius]. Anthophorini.
- Parammobates Friese, 1906e:118. Type species: Parammobates brasiliensis Friese, 1906, monobasic. Epeolini.

- Parammobatodes Popov, 1931b:462. Type species: Phiarus minutus Mocsáry, 1878. by original designation.

 Amnobatini.
- Parandrena Robertson, 1897:337. Type species: Panurgus andrenoides Cresson, 1878, by designation of Cockerell, 1897a:288. Andreninae.
- Parandrenella Popov, 1958:112. Type species: Andrena dentiventris Morawitz, 1874, by original designation. [Andrena]. Andreninae.
- Paranomada Linsley and Michener, 1937:82. Type species: Paranomada nitida Linsley and Michener, 1937, by original designation. **Brachynomadini.**
- Paranomia Friese, 1897b:48, not Conrad, 1860. Type species: Nomia chalybeata Smith, 1875, by designation of Cockerell, 1910f:290. [Nomia]. See Paranomina. Nomiinae.
- Paranomina Michener, 1944:251, not Hendel, 1907, replacement for Paranomia Friese, 1897. Type species: Nomia chalybeata Smith, 1875, by original designation and autobasic. Not replaced because subjective synonym of Acunomia. [Nomia]. Nomiinae.
- Paranomioides Pesenko, 1983:175. Type species: Nomioides steinbergi Pesenko, 1983, by original designation. [Nomioides]. Nomioidinae.
- Paranthidiellum Michener, 1948a:25. Type species: Anthidium cribratum Morawitz, 1875, by original designation. Anthidiini.
- Paranthidium Cockerell and Cockerell, 1901:50. Type species: Anthidium perpictum Cockerell, 1898, by original designation. Anthidiini.
- Paranthocopa Tkalců, 1974b:132. Type species: Osmia pinquis Pérez, 1895, by original designation. [Anthocopa]. Osmiini.
- Paranychium Toro and Herrera, 1980:213. Not valid because no type species was designated. [Callonychium]. See Paranychium Toro. Panurginae.
- Paranychium Toro, 1989:231. Type species: Camptopoeum chilense Friese, 1906, by original designation. [Callonychium]. Panurginae.
- Parapachyprosopis Exley, 1972:17. Type species: Pachyprosopis angophorae Cockerell, 1912, by original designation. [Pachyprosopis]. Euryglossinae.
- Parapartamona Schwarz, 1948:428. Type species: Trigona zonata Smith, 1854, by original designation. [Trigona]. Meliponini.
- Parapolyglossa Brauns, 1929:134. Type species: Polyglossa heterodoxa Cockerell, 1921, by designation of Sandhouse. 1943:584. Sandhouse recorded the type as by "original designation," but this was an error. [Polyglossa]. Colletinae.
- Paraprosopis Popov, 1939:169, replacement for Campanularia Méhelÿ. Type species: Hylaeus pictipes Nylander, 1852, by original designation. [Prosopis]. Hylaeinae.
- Parapsaenythia Friese, 1908b:42. Type species: Psaenythia argentina Friese, 1908 = Caenohalictus serripes Ducke, 1908, monobasic. [Psaenythia]. Panurginae.

- Pararhophites Friese, 1898c:305. Type species: Pararhophites quadratus Friese, 1898, monobasic. Although he described Pararhophites as a subgenus of Rhophites, Friese described the species using Pararhophites as a genus. [Rophites]. Pararhophitini.
- Parasarus Ruz, 1993, in Ruz and Rozen, 1993:2. Type species: Parasarus atacamensis Ruz, 1993, by original designation. Panurginae.
- Parasphecodes Smith, 1853;39. Type species: Parasphecodes hilactus Smith, 1853, by designation of Sandhouse, 1943:585. Halictini.
- Paratetrapedia Moure, 1941b:517. Type species: Ancyloscelis lineata Spinola, 1851, by original designation. Tapinotaspidini.
- Parathrincostoma Blüthgen, 1933:389. Type species: Parathrincostoma seyrigi Blüthgen, 1933, by original designation. Halictini.
- Paratrigona Schwarz, 1938:487. Type species: Melipona prosopiformis Gribodo, 1893, by original designation. [Trigona]. Meliponini.
- Paraugochlora Schrottky, 1910:540. Type species: Augochlora spinolae Cockerell, 1900, by original designation. Augochlorini.
- Paraugochloropsis Schrottky, 1906a:312. Type species: Augochloropsis lycorias Schrottky. 1906 = Augochlora epipyrgitis Holmberg, 1903, monobasic. [Augochloropsis]. Augochlorini.
- Paremisia Moure, 1945c;406. Type species: Centris lineolata Lepeletier, 1841 = Bombus similis Fabricius, 1804, by original designation. Centridini.
- Parepeolus Ducke, 1912:71, 102. Type species: Leiopodus lecointei Ducke, 1907 = Epeolus aterrima Friese, 1906, by designation of Sandhouse, 1943:585. Osirini.
- Parepicharis Moure, 1945b:307. Type species: Epicharis zonata Smith, 1854, by original designation. Centridini.
- Pareucera Tkalců, 1978:164. Type species: Eucera caspica Morawitz, 1873, by original designation. [Eucera]. Eucerini.
- Parevaspis Ritsema, 1874:1xxi. Type species: Parevaspis basalis Ritsema. 1874, by designation of Sandhouse, 1943:585.

 Anthidiini.
- Pariotrigona Moure. 1961:192. Type species: Trigona pendleburyi Schwarz, 1939, by original designation. Meliponini.
- Paroxystoglossa Moure, 1940:59. Type species: Oxystoglossa jocasta Schrottky, 1910, by original designation. Augochlorini.
- Partamona Schwarz, 1939b:23, replacement for Patera Schwarz. 1938. Type species: Melipona testacea Klug, 1807, autobasic and original designation. [Trigona]. Meliponini.
- Pasiphae Spinola, 1851:226, not Latreille, 1819. Type species: Pasiphae caerulescens Spinola, 1851, designated by Sandhouse, 1943:585. See Spinolapis. Colletinae.

- Pasites Jurine, 1807:224. Type species: Pasites maculata Jurine, 1807, by original designation. Subsequent designation: Nomada schottii Fabricius, 1804 = Tiphia brevicornis Panzer, 1798, by Latreille, 1810:439. Ammobatini.
- Pasitomachtes Sandhouse, 1943:586, unjustified emendation of Pasitomachthes Bischoff, 1923. Ammobatini.
- Pasitomachthes Bischoff, 1923:596. Type species: Pasitomachthes nigerrimus Bischoff, 1923, by original designation. Bischoff (1923) confusingly gave the type species as nigerrimus (without genus or author) after mentioning Pasites nigerrimus Friese, 1922. He included the latter among species of Morgania, however, and clearly intended Pasitomachthes nigerrimus Bischoff, Amnobatini.
- Patagiata Blüthgen, 1949:77. Type species: Prosopis difformis Eversmann, 1852, by original designation. [Prosopis]. Hylaeinae.
- Patellapis Friese, 1909a:148. Type species: Halictus schultzei Friese, 1909, by designation of Cockerell, 1920b:311. [Halictus]. Halictini.
- Patera Schwarz, 1938:475, not Lesson, 1837. Type species: Melipona testacea Klug, 1807, by original designation. [Trigona]. See Partamona. Meliponini.
- Pauphalictus Warncke, 1981:87. Type species: Halictus pauperatus Brullé, 1832, by original designation. [Halictus]. Halictini.
- Pavostelis Sladen, 1916b:313. Type species: Stelis montana Cresson, 1864, monobasic. [Stelis]. Anthidiini.
- Pectinapis LaBerge. 1970:322. Type species: Pectinapis fasciata LaBerge, 1970, by original designation. Eucerini.
- Pectinata Méhelÿ, 1935:54, 161. Invalid because no type species was designated. [Prosopis]. Sandhouse's (1943:586) view that Popov (1939:169) designated a type species and thus validated the name is incorrect. Hylaeinae.
- Pelandrena Cockerell, 1909f:159. Type species: Pelandrena reducta Cockerell, 1909, monobasic. Fossil.
- Pelicandrena LaBerge and Ribble, 1972:346. Type species: Parandrena atypica Cockerell, 1941, by original designation. [Andrena]. Andreninae.
- Penapis Michener, 1965b:324. Type species: Penapis penai Michener, 1965, by original designation. Rophitinae.
- Peniella Toro and Ruz, 1972:146. Type species: Camptopoeum maculatum Spinola, 1851, by original designation. [Spinoliella]. Panurginae.
- Pentadentosmia Warncke, 1991a:14. Type species: Osmia quinquespinosa Friese, 1899, by original designation. [Osmia]. Osmiini.
- Pentaperdita Cockerell and Porter, 1899:414. Type species: Perdita albovittata Cockerell, 1895, monobasic. [Perdita]. Panurginae.
- Penteriades Michener and Sokal. 1957:158. Type species: Osmia remotula Cockerell, by original designation. [Proteriades]. Osmiini.

- Penthemisia Moure, 1950c:390. Type species: Hemisia chilensis Spinola, 1851, by original designation. [Centris]. Centridini.
- Peponapis Robertson, 1902b:324. Type species: Macrocera pruinosa Say, 1837, by original designation. Eucerini.
- Perdita Smith, 1853:128. Type species: Perdita halictoides Smith, 1853, monobasic. Isotypic with Zaperdita by synonymy. Panurginae.
- Perditella Cockerell, 1899b:312. Type species: Perdita "laneae" Cockerell, 1899, error for P. larreae Cockerell, 1896, by original designation. [Perdita]. Panurginae.
- Perditomorpha Ashmead, 1899a:86. Type species: Perditomorpha brunerii Ashmead, 1899, monobasic. Colletinae.
- Perditopasites Rozen, 1992:49. Type species: Oreopasites linsleyi Rozen, 1992, by original designation. [Oreopasites]. Animobatini.
- Pereirapis Moure, 1943b:461. Type species: Pereirapis rhizophila Moure, 1943, by original designation. Augochlorini.
- Perezia Ferton, 1914:233, not Leger and Dubosc, 1909. Type species: Perezia maura Ferton, 1914 = Megachile leachella Curtis, 1828, monobasic. See Fertonella. Megachilini.
- Perissander Michener, 1942:275. Type species: Calliopsis anomoptera Michener, 1942, by original designation. [Calliopsis]. Panurginae.
- Perixylocopa Hurd and Moure, 1963:232. Type species: Xylocopa erythrina Gribodo. 1894, by original designation. [Xylocopa]. Isotypic with Euxylocopa by synonymy. Xylocopini.
- Petalosternon Brooks, 1988:484. Type species: Anthophora rivolleti Pérez, 1895, by original designation. [Anthophora]. Anthophorini.
- Phaceliapis Michener, 1942:277. Type species: Conanthalictus bakeri Crawford, 1907, by original designation. [Conanthalictus]. Rophitinae.
- Phaenosarus Mitchell, 1934:303, 309. Type species: Megachile fortis Cresson, 1872, by original designation. [Megachile]. Megachilini.
- Phaeosmia Michener, 1943:77. Type species: Osmia enceliae Cockerell, 1935, by original designation. [Anthocopa]. Osmiini.
- Phanomalopsis Michener and Moure, 1957:430. Type species: Exomalopsis jenseni Friese, 1908, by original designation. [Exomalopsis]. Exomalopsini.
- Pharohylaeus Michener, 1965a:141. Type species: Meroglossa lactifera Cockerell, 1910, by original designation. Hylaeinae.
- Phelonomada Snelling. 1986:24. Type species: Nomada belfragei Cresson, 1878, by original designation. [Nomada]. Nomadini.
- Phenacolletes Cockerell, 1905b:301. Type species: Phenacolletes mimus Cockerell, 1905, monobasic. Colletinae.
- Phiarus Gerstaecker, 1869:147. Type species: Phileremus abdominalis Eversmann, 1852, monobasic. Isotypic with Ammobatoides Radoszkowski and Paidia. Ammobatoidini.

- Phileremulus Cockerell, 1895:9. Type species: Phileremulus vigilans Cockerell, 1895, by original designation. Neolarrini.
- Phileremus Latreille, 1809:169. Type species: Epeolus punctatus Fabricius, 1804, by designation of Latreille, 1810:439. Phileremus oraniensis Lepeletier, 1841, designated as type species by Blanchard, 1849:pl. 128 (1847) was not originally included. Isotypic with Ammobatoides Schenk by synonymy. Ammobatini.
- Philotrachusa Pasteels, 1969a:22. Type species: Anthidium aquifilum Strand, 1912, by original designation. [Trachusa].Anthidiini.
- Philoxanthus Ashmead, 1898:285. Type species: Perdita beata Cockerell, 1895, by original designation. Panurginae.
- Phor Robertson, 1903d:174, 175, 176. Type species: Nomada integra Robertson, 1893 (not Brullé, 1832) = Nomada integerrima Dalla Torre, 1896, by original designation.
 Nomadini.
- Phyllotoma Duméril, 1860:842, not Leach, 1819. Type species: Apis papaveris Latreille, 1799, by designation of Michener, 1941:160. Not replaced because isotypic with Anthocopa and with Furcosmia. Osmiini.
- Physostetha Michener, 1938a:523. Type species: Heriades carinatum Cresson, 1864, by original designation. [Heriades]. Osmiini.
- Pileteucera Sitdikov and Pesenko, 1988:87. Type species: Eucera cineraria Eversmann, 1852 = ?E. cinerea Lepeletier, 1841, by original designation. [Eucera]. Eucerini.
- Pithitis Klug, 1807, in Illiger, 1807:198; Klug, 1807b:225. Type species: Apis smaragdula Fabricius, 1787, monobasic. The papers by Illiger and Klug were published simultaneously: Illiger credited the name Pithitis to Klug and it is customary and appropriate to do so. Ceratinini.
- Planiandrena Osychnyuk 1983:794. Type species: Andrena planirostris Morawitz. 1876, by original designation. [Andrena]. Andreninae.
- Planihylaeus Houston, 1981:96. Type species: Prosopis trilobata Cockerell, 1910, by original designation. [Hylaeus]. Hylaeinae.
- Plastandrena Hedicke, 1933:217. Type species: Melitta tibialis Kirby, 1802, by original designation. [Andrena]. Andreninae.
- Platandrena Viereck, 1924:21. Type species: Andrena nasonii Robertson, 1895, by original designation. [Andrena]. Andreninae.
- Platinopoda Dalla Torre, 1896:202, lapsus for Platynopoda Westwood, 1840. **Xylocopini.**
- Platosmia Warncke, 1990:482. Type species: Osmia platalea Warncke, 1990, by original designation. [Osmia]. Osmiini.
- Platychile Michener. 1965a:205, nomen nudum. Type species: Megachile foliata Smith, 1861, monobasic. Error for Callochile. [Megachile]. Megachilini.
- Platycoelioxys Mitchell, 1973:120. Type species: Coelioxys spatuliventer Cockerell, 1927, by original designation. [Coelioxys]. Megachilini.

- Platyhalictus Pesenko, 1984:347. Type species: Halictus minor Morawitz, 1876, by original designation. [Halictus]. Halictini.
- Platynopoda Westwood, 1840b:271. Type species: Apis latipes Drury, 1773, by designation of Ashmead, 1899a:71. [Xylocopa]. Isotypic with Audinetia. **Xylocopini.**
- Platyspatulariella Pittioni, 1950:80. Type species: *Prosopis punctata* Brullé, 1832, by original designation. [Prosopis]. **Hylaeinae.**
- Platysta Pasteels, 1965:171. Type species: Megachile platystoma Pasteels, 1965, by original designation. [Megachile]. Megachilini.
- Platysvastra Moure, 1967b:148. Type species: Platysvastra macraspis Moure, 1967, by original designation. Eucerini.
- Platytrigona Moure, 1961:203. Type species: Trigona planifrons Smith, 1864, by original designation. Meliponini.
- Plebeia Schwarz, 1938:480. Type species: *Trigona mosquito* Smith, 1863, by original designation. [Trigona]. **Meliponini.**
- *Plebeiella* Moure, 1961:226. Type species: *Trigona lendliana* Friese, 1900, by original designation. **Meliponini.**
- Plebeina Moure, 1961:228. Type species: Melipona denoiti Vachal. 1903, by original designation. Meliponini.
- Plesianthidium Cameron, 1905:256. Type species: Plesianthidium fulvopilosum Cameron, 1905, by original designation. **Anthidiini.**
- Plesiopanurgus Cameron, 1907:130. Type species: Plesiopanurgus cinerarius Cameron, 1907, monobasic. Panurginae.
- Plistotrichia Morawitz, 1873a:134. Type species: Nomia flavilabris Lucas, 1846 = Ancyla oraniensis Lepeletier, 1841, monobasic. Isotypic with Ancyla by synonymy. Ancylini.
- Plusia Hoffmannsegg 1817:52, not Hübner, 1806. Type species: Plusia superba Hoffmannsegg, 1817, monobasic. See Euplusia. Euglossini.
- Podalirius Latreille, 1802a:430. Type species: Apis pilipes Fabricius. 1775 = Apis plumipes Pallas, 1772. Suppressed by Commission Opinion 151 (1944), Direction 4. See Anthophora. Isotypic with Megilla and Anthophora. Anthophorini.
- Podasys Rafinesque, 1815:123, unjustified replacement for Dasypoda Latreille, 1802. Type species: Andrena hirtipes Fabricius, 1793, autobasic. Dasypodinae.
- Poecilandrena Hedicke, 1933:218. Type species: Andrena labiata Fabricius, 1781, by original designation. [Andrena]. Andreninae.
- Poecilobombus Dalla Torre, 1882:23. Type species: Bombus sitkensis Nylander, 1848, by designation of Sandhouse, 1943:589. [Bombus]. Bombini.
- Poecilocentris Friese, 1900:244, 252. Type species: Centris fasciatella Friese, 1900, by designation of Sandhouse, 1943:589. [Centris]. Centridini.
- Poecilomelitta Friese, 1913a:574 and 1913b:585. Type species: Poecilomelitta flavida Friese, 1913, by designation of Sandhouse, 1943:589. Poecilomelitta was described as new twice. Panurginae.

- Poliandrena Warncke, 1968:71. Type species: Andrena polita Smith, 1847, by original designation. [Andrena]. Andreninae.
- Policana Friese, 1910a:651. Type species: Colletes herbsti Friese, 1910 = Colletes albopilosus Spinola, 1851, by designation of Sandhouse, 1943:589. **Diphaglossinae.**
- Polybiapis Cockerell, 1916d:208. Type species: Polybiapis minus Cockerell, 1916, by original designation. Nomadini.
- Polyglossa Friese, 1909a:123. Type species: Polyglossa capensis Friese, 1909, by designation of Cockerell, 1921a:203. Sandhouse's (1943:589) subsequent designation of *P. albitarsis* Friese, 1909, is invalid. **Colletinae.**
- Pomibombus Skorikov, 1938a:145, unjustified emendation of Pomobombus Krüger, 1917. **Bombini.**
- Pomobombus Krüger, 1917:65. Type species: Brenus pomorum Panzer, 1804, by designation of Sandhouse, 1943:589. [Bombus]. Isotypic with Rhodobombus. Bombini.
- Pontanthidium Pasteels, 1969a:105. Type species: Anthidium pontis Cockerell, 1933, by original designation. [Anthidium].
- Popovapis Michener, 1981:80. Type species: Rhophites dispar Morawitz, 1892, by original designation. [Eremaphanta]. **Dasypodinae.**
- Porterapis Michener, 1989:678. Type species: Lonchopria porteri Ruiz, 1936, by original designation. [Lonchopria]. Colletinae.
- Pratibombus Skorikov, 1937:59, unjustified emendation of Pratobombus Vogt, 1911. Bombini.
- Pratobombus Vogt, 1911:49. Type species: Apis pratorum Linnaeus, 1761, by designation of Frison, 1927:67. [Bombus]. **Bombini.**
- Presbia Sandhouse, 1943:590, nomen nudum. See Daly et al., 1987, Manueliini.
- *Pressibombus* Frison, 1935:342. Type species: *Bremus pressus* Frison, 1935, by original designation. [Bremus]. **Bombini.**
- Prionohoplitis Tkalců, 1993a:55. Type species: Osmia curvipes Morawitz, 1871, by original designation. [Hoplitis]. Osmiini.
- Proanthidium Friese, 1898a:101. Type species: Anthidium oblongatum Latreille, 1809 = Anthophora oblongata Illiger, 1806, by designation of Cockerell, 1909b:269. Pasteels (1969a) incorrectly listed Anthidium undulatum Dours as the type species of Proanthidium. [Anthidium]. Anthidiini.
- Probombus Piton, 1940:218. Type species: Probombus hirsutus Piton, 1940, monobasic. Fossil.
- Prochelostoma Robertson, 1903a:167. Type species: Heriades philadelphi Robertson, 1891, by original designation. Osmiini.
- Procockerellia Timberlake, 1954:402. Type species: Perdita albonotata Timberlake, 1954, by original designation. [Perdita]. Panurginae.
- Prodasyhalonia LaBerge, 1958:199. Type species: Gaesischia mexicana LaBerge, 1958, by original designation. [Gaesischia]. Eucerini.

- Prodioxys Friese, 1914a:221. Type species: Prodioxys cinnabarina Friese, 1914 = Dioxys longiventris Pérez, 1895, monobasic. **Dioxyini.**
- Prohalictus Pesenko, 1984:346, not Armbruster, 1938. Type species: Apis rubicunda Christ, 1791, by original designation. [Halictus]. See Protohalictus. Halictini.
- Promelitta Warncke, 1977:59. Type species: Dufourea alboclypeata Friese, 1900, by original designation. [Melitta]. **Dasypodinae.**
- Proplebeia Michener, 1982:44. Type species: Trigona dominicana Wille and Chandler, 1964, by original designation. [Trigona]. Fossil. Meliponini.
- Prosamba Michener, 1981:63. Type species: Haplomelitta griseonigra Michener, 1981, by original designation. [Haplomelitta]. Dasypodinae.
- Prosapis Ashmead, 1894:43, unjustified emendation of Prosopis Fabricius. 1804. **Hylaeinae.**
- Prosopalictus Strand, 1913b:26. Type species: Prosopalictus micans Strand, 1913 (not Halictus micans Strand, 1909, senior homonym in Lasioglossum) = Lasioglossum micante Michener, 1993, by original designation. Halictini.
- *Prosopella* Snelling, 1966:139. Type species: *Hylaeus hurdi* Snelling, 1966, by original designation. [Hylaeus]. **Hylaeinae.**
- *Prosopis* Jurine, 1801:164. Suppressed by Commission Opinion 135 (1939). **Hylaeinae.**
- Prosopis Fabricius, 1804:293. Type species: Mellinus bipunctatus
 Fabricius, 1798 = Sphex signata Panzer, 1798, designated by
 Morice and Durrant, 1915:416. Isotypic with Cingulata by synonymy. Hylaeinae.
- Prosopisteroides Hirashima, 1967:134. Type species: Hylaeus heteroclitis Hirashima, 1967, by original designation. [Hylaeus]. Hylaeinae.
- Prosopisteron Cockerell, 1906b:17. Type species: Prosopisteron serotinellum Cockerell, 1906, monobasic. Hylaeinae.
- Prosopoides Friese. 1908b:338 (reprint p. 10). Type species: Oediscelis paradoxus "Ducke" Friese, 1908 = Oediscelis prosopoides Ducke, 1907, monobasic. The name Prosopoides was published rather casually by Friese and attributed to Ducke. However, there was no description by Ducke and I agree with Sandhouse (1943) in attributing the name to Friese. Xeromelissinae.
- Prosopoxylocopa Hurd and Moure, 1963:215. Type species: Xylocopa mirabilis Hurd and Moure, 1963, by original designation. [Xylocopa]. Xylocopini.
- Protandrena Cockerell, 1896:91. Type species: Andrena maurula Cockerell, 1896, by designation of Sandhouse, 1943:591. Panurginae.
- Protandrenopsis Crawford, 1903:337. Type species: Protandrenopsis fuscipennis Crawford, 1903 = Panurgus aethiops Cresson, 1872, by original designation. Isotypic with Pseudopanurgus by synonymy. Panurginae.
- Protanthidium Cockerell and Cockerell, 1901:49. Type species:Megachile steloides Bingham, 1896 (preoccupied in

- Anthidium; see Michener and Griswold, 1994a) = Anthidium longicorne Friese, 1902, by original designation. Anthidiini.
- Protepeolus Linsley and Michener, 1937:75. Type species: Protepeolus singularis Linsley and Michener, 1937, by original designation. **Protepeolini.**
- Proteraner Robertson, 1903b:103. Type species: Sphecodes ranunculi Robertson, 1897, monobasic. Halictini.
- Proteriades Titus, 1904a:25. Type species: Proteriades semirubra Cockerell, 1898, monobasic. Osmiini.
- Protoanthidium Cameron, 1902b:125. Type species: Protoanthidium rufobalteatum Cameron, 1902, by designation of Sandhouse, 1943:591. Anthidiini.
- Protobombus Cockerell, 1908d:326; also described as new by Cockerell, 1909e:9. Type species: Protobombus indecisus Cockerell, 1908, monobasic; also designated by Cockerell, 1909e:10. Fossil.
- Protodiscelis Brèthes, 1909a:245. Type species: Protodiscelis fiebrigi Brèthes, 1909, monobasic. Colletinae.
- Protodufourea Timberlake, 1955:105. Type species: Protodufourea wasbaueri Timberlake, 1955, by original designation. Rophitinae.
- Protohalictus Pesenko, 1986b:631, replacement for Prohalictus Pesenko, 1984. Type species: Apis rubicunda Christ, 1791, autobasic. [Halictus]. Halictini.
- Protomelecta Cockerell, 1908c:341. Type species: Protomelecta brevipennis Cockerell, 1908, monobasic. Fossil.
- Protomelissa Friese, 1914c(June):322. Type species: Protomelissa iridescens Friese, 1914(June) = Tetralonia (?) hoozana Strand, 1914(Apr.-May), by designation of Sandhouse, 1943:592. Lieftinck's (1983) contention that the type species is Anthophora sauteri Friese, 1911(May) = Melecta formosana Cockerell, 1911(Mar.), is not justified. Isotypic with Tetralonioidella by synonymy. Melectini.
- Protomeliturga Ducke, 1912:63, 90. Type species: Calliopsis turnerae Ducke, 1907, monobasic. Panurginae.
- Protomorpha Rayment, 1959b:334. Type species: Protomorpha tarsalis Rayment, 1959, by original designation. Colletinae.
- Protopithitis Hirashima, 1969:651. Type species: Ceratina aereola Vachal, 1903, by original designation. [Pithitis].Ceratinini.
- Protosiris Roig-Alsina, 1989:20. Type species: Osiris obtusus Michener, 1954, by original designation. Osirini.
- Protosmia Ducke, 1900:12. Type species: Heriades glutinosus Giraud, 1871, designation by Michener, 1943:86 and Sandhouse, 1943:592. [Osmia]. Osmiini.
- Protostelis Friese, 1895:25. Type species: Stelis freygessneri Friese, 1885 = Anthidium annulatum Lepeletier, 1841, by designation of Popov, 1938:41. [Stelis]. Anthidiini.
- Protoxaea Cockerell and Porter, 1899:410. Type species: Megacilissa gloriosa Fox, 1893, by original designation. Oxaeinae.
- Proxylocopa Hedicke, 1938:192. Type species: Xylocopa olivieri Lepeletier, 1841, by original designation. [Xylocopa]. Xylocopini.

- Psaenythia Gerstaecker, 1868:111. Type species: Psaenythia philanthoides Gerstaecker. 1868, by designation of Sandhouse, 1943:592. Panurginae.
- Psammandrena LaBerge, 1977:83. Type species: Andrena cercocarpi Cockerell, 1936, by original designation. [Andrena]. Andreninae.
- Pseudagapostemon Schrottky, 1909a:145. Type species: Agapostemon arenarius Schrottky, 1902, by original designation. Halictini.
- Pseudapis W. F. Kirby, 1900:15. Type species: Pseudapis anomala W. F. Kirby, 1900, monobasic. Nomiinae.
- Pseudaugochlora Michener, 1954:77. Type species: Halictus nigromarginatus Spinola, 1851 = Megilla graminea Fabricius, 1804, by original designation. [Caenaugochlora]. Augochlorini.
- Pseudaugochloropsis Schrottky, 1906a:313. Type species: Augochloropsis sthena Schrottky, 1906, by designation of Sandhouse, 1943:593. Halictus nigromarginatus Spinola, designated as the type species by Moure, 1940:51, was not an originally included species; see Michener, 1995. [Augochloropsis]. Angochlorini.
- Pseudepeolus Holmberg, 1886b:234, 284. Type species: Pseudepeolus fasciatus Holmberg, 1886, monobasic. Epcolini.
- Pseudeucera Tkalců, 1978:157, 158. Type species: Eucera parvicornis Mocsáry, 1878, by original designation. Eucerini.
- Pseudhylaeus Cockerell, 1929b:299. Type species: Euryglossa albocuneata Cockerell, 1913, by original designation. Hylaeinae.
- Pseudiscelis Friese, 1906a:228. Type species: Pseudiscelis rostrata Friese, 1906, monobasic. The type species was described in this combination although the genus-group name was proposed as a subgenus of Oediscelis. [Oediscelis]. Xeromelissinae.
- Pseudoanthidium Friese, 1898a:101. Type species: Anthidium alpinum Morawitz, 1873, designated by Sandhouse, 1943:593. [Anthidium]. Anthidiini.
- Pseudobranchiata Méhelÿ, 1935:33, 139. Invalid because no type species was designated. Sandhouse's (1943:593) view that Popov (1939) designated a type species and thus validated this name is incorrect. [Prosopis]. Hylaeinae.
- Pseudocentron Mitchell, 1934:307. Type species: Megachile pruina Smith, 1853, by original designation. Megachilini.
- Pseudochilalictus Michener, 1965a:170. Type species: Lasioglossum imitator Michener, 1965, by original designation. [Lasioglossum]. Halietini.
- Pseudocilissa Radoszkowski, 1891:241. Type species: Cilissa robusta Radoszkowski, 1876 = Melitta dimidiata Morawitz, 1876, monobasic. Melittinae.
- *Pseudocosnia* Radoszkowski, 1886:14, unjustified emendation of *Pseudosmia* Radoszkowski, 1872. **Osmiini.**
- Pseudodichroa Bischoff, 1923:595. Type species: Omachtes capensis Friese, 1915, by designation of Sandhouse, 1943:593. Ammobatini.

- *Pseudoheriades* Peters, 1970:153. Type species: *Eriades moricei* Friese, 1897, by original designation. **Osmiini.**
- Pseudoliphanthus Ruz and Toro, 1983:253. Type species: Liphanthus rozeni Ruz and Toro, 1983, by original designation. [Liphanthus]. Panurginae.
- Pseudomacrotera Timberlake, 1954:349. Type species: Perdita turgiceps Timberlake, 1954, by original designation. [Perdita]. Panurginae.
- Pseudomegachile Friese. 1898b:198, no included species; Friese, 1899c:36, included species. Type species: Megachile ericetorum Lepeletier, 1841, designated by Alfken, 1933:56. [Megachile]. Megachilini.
- Pseudomegalochila Schulz, 1906:71, unjustified emendation of Pseudomegachile Friese, 1898. [Megachile]. Megachilini.
- Pseudomelecta Radoszkowski, 1865:55. Type species: Melecta diacantha Eversmann, 1852, by designation of Sandhouse, 1943:594. Melectini.
- *Pseudo-osmia* Radoszkowski, 1874a:137, unjustified emendation of *Pseudosmia* Radoszkowski, 1872. **Osmiini.**
- Pseudoosmia Radoszkowski, 1874b:152, unjustified emendation of Pseudosmia Radoszkowski, 1872. Osmiini.
- Pseudopanurgus Cockerell, 1897a:290. Type species: Panurgus aethiops Cresson, 1872, by original designation. Isotypic with Protandrenopsis by synonymy. Panurginae.
- Pseudopasites Bischoff, 1923;593. Type species: Pasites pygmaeus Friese, 1922, by designation of Sandhouse, 1943;594. [Sphecodopsis]. Ammobatini.
- Pseudopeolus Ashmead, 1899a:80, unjustified emendation of Pseudepeolus Holmberg, 1886. Epeolini.
- Pseudophilanthus Alfken, 1939:121. Type species: Pseudophilanthus taeniatus Alfken, 1939, monobasic. Meganomiinae.
- Pseudosarus Ruz, 1980:25. Type species: Pseudosarus virescens Ruz, 1980, monobasic. **Panurginae.**
- Pseudosmia Radoszkowski, 1872a:xviii, no included species; Radoszkowski, 1874b:152, included species. Type species: Megachile cristata Fonscolombe, 1846, not Dufour, 1841 = Anthocopa cristatula Zanden, 1990, by designation of Cockerell, 1922a:6. Osmiini.
- Pseudostelis Popov, 1956:167. Type species: Stelis strandi Popov, 1935, by original designation. Anthidiini.
- Psilomelissodes LaBerge, 1956:1173. Type species: Melissodes intorta Cresson, 1872, by original designation. [Melissodes]. Eucerini.
- Psilylaeus Snelling, 1985:28. Type species: Psilylaeus sagiops Snelling, 1985 = Prosopis perhumilis Cockerell, 1914, by original designation. **Hylaeinae**.
- Psithyrus Lepeletier, 1832:373. Type species: Apis rupestris Fabricius, 1793, by designation of Curtis, 1833:pl. 468. Isotypic with *Bremus* Kirby. **Bombini.**
- Pteneucera Tkalců, 1984c:72. Type species: Eucera eucnemidea Dours, 1873, by original designation. Eucerini.

- Pterandrena Robertson, 1902a:187, 193. Type species: Andrena pulchella Robertson, 1891 (not Jurine, 1807) = Andrena accepta Viereck, 1916, by original designation. Andreninae.
- Pterosarus Timberlake, 1967:10. Type species: Calliopsis rudbeckiae Robertson, 1895, by original designation. [Pseudopanurgus]. Panurginae.
- Ptilandrena Robertson, 1902a:187, 192. Type species: Andrena erigeniae Robertson, 1891, by original designation. Andreninae.
- Ptilocentris Snelling, 1984:22. Type species: Centris festiva Smith, 1854, by original designation. [Centris]. Centridini.
- Ptilocleptis Michener, 1978b:315. Type species: Ptilocleptis tomentosa Michener, 1978, by original designation. Halictini.
- Ptiloglossa Smith, 1853:7. Type species: Ptiloglossa ducalis Smith, 1853, monobasic. Caupolicanini.
- Ptiloglossidia Moure, 1953a:73. Type species: Ptiloglossidia fallax Moure, 1953, by original designation. Dissoglottini.
- Ptiloglossodes Moure, 1945a:153. Type species: Megacilissa tarsata Friese, 1900, by original designation. [Ptiloglossa]. Caupolicanini.
- Ptilomelissa Moure, 1943b:482. Type species: Melissoptila bonaerensis Holmberg, 1903, by original designation. Eucerini.
- Ptilonomia Michener, 1965a:160. Type species: Nomia plumosa Michener, 1965, by original designation. [Nomia]. Nomiinae.
- Ptilopoda Friese, 1921b:83. Type species: Colletes maculipennis Friese, 1921 = Colletes spiloptera Cockerell, 1917, monobasic. [Colletes]. Colletinae.
- Ptilosaroides Mitchell, 1980:63. Type species: Megachile neoxanthoptera Cockerell. 1933, by original designation. [Cressoniella]. Megachilini.
- Ptilosarus Mitchell, 1943:667. Type species: Megachile bertonii Schrottky, 1908, by original designation. [Megachile]. Megachilini.
- Ptilothrix Smith, 1853:131. Type species: Ptilothrix plumatus Smith, 1853, monobasic. Isotypic with Energoponus by synonymy. Emphorini.
- Ptilothryx Marschall, 1873:269, unjustified emendation of Ptilothrix Smith, 1853. Emphorini.
- Ptilotopus Klug, 1810:32. Type species: Ptilotopus americanus Klug, 1810, monobasic. Centridini.
- Ptilotrigona Moure, 1951a:47. Type species: Trigona heideri Friese, 1900 = Trigona lurida Smith, 1854, by original designation. [Trigona]. Meliponini.
- Ptoleglossa Friese, 1930:127, replacement for Leptoglossa Friese, 1925. Type species: Leptoglossa paradoxa Friese, 1925 = Orphana inquirenda Vachal, 1909, autobasic. Isotypic with Leptoglossa and by synonymy with Orphana. Andreninae.
- Puncthalictus Warncke, 1975b:87. Type species: Hylaeus punctatissimus Schenck, 1853, by original designation. [Halictus]. Halictini.
- Puncticolletes Noskiewicz, 1936:26, 490. Invalid because no type species was designated. Warncke (1978) considered

- *Puncticolletes* a synonym of *Rhinocolletes*. [Colletes]. **Colletinae.**
- Pycnanthidium Krombein, 1951:292. Type species: Pycnanthidium solomonis Krombein, 1951, by original designation. Anthidiini.
- Pyganthophora Brooks, 1988:460. Type species: Apis retusa Linnaeus, 1758, by original designation. [Anthophora]. Anthophorini.
- Pyghalictus Warncke, 1975b:103. Type species: Andrena pygmaea Fabricius, 1804, by original designation. Pyghalictus was intended for the group of what is usually called Lasioglossum politum (Schenck). The identity of Andrena pygmaea Fabricius is in doubt (see Ebmer, 1988). [Halictus]. Halictini.
- Pygnanthidiellum Mavromoustakis, 1963b:492. Type species: Anthidium zebra Friese, 1904, by original designation. [Pygnanthidium]. Anthidiini.
- Pygnanthidium Mavromoustakis, 1963b:491, unjustified emendation of Pycnanthidium Krombein, 1951. Anthidiini.
- Pygopasiphae Michener, 1989:647. Type species: Leioproctus mourellus Michener, 1989, by original designation. [Leioproctus]. Colletinae.
- Pygoperdita Timberlake, 1956:275. Type species: Perdita interrupta Cresson, 1878, by original designation. [Perdita].Panurginae.
- Pyrobombus Dalla Torre, 1880:40. Type species: Apis hypnorum Linnaeus. 1758, monobasic. [Bombus]. Isotypic with Anodontobombus, Uncobombus, and Hypnorobombus. Bombini.
- Pyrosmia Tkalců, 1975b:182. Type species: Osmia ferruginea Latreille, 1811, by original designation. [Osmia]. Osmiini.
- Pyrrhobombus Dalla Torre, 1882:28, unjustified emendation of Pyrobombus Dalla Torre, 1880. [Bombus]. Bombini.
- Pyrrhomelecta Ashmead, 1899a:66. Type species: Epeolus glabratus Cresson, 1878, by original designation. Epeolini.
- Quasihesma Exley, 1968a:228. Type species: Quasihesma moonbiensis Exley, 1968, by original designation. Euryglossinae.
- Quasilictus Walker, 1986:166. Type species: Homalictus brevicornutus Walker, 1986, by original designation. [Homalictus]. Halictini.
- Radoszkowskiana Popov, 1955b:547, replacement for Paracoelioxys Radoszkowski, 1893. Type species: Paracoelioxys barrei Radoszkowski, 1893, autobasic and by original designation. Megachilini.
- Ramalictus Pesenko, 1984:347. Type species: Halictus latisignatus Cameron, 1908, by original designation. [Halictus]. Halictini.
- Ramphorhina Michener, 1939:8, lapsus for Arogochila Michener, 1939. [Ashmeadiella]. **Osmiini.**
- Ranthidiellum Pasteels, 1969a:48. Type species: Protoanthidium rufomaculatum Cameron, 1902, by original designation. For aspects of this type designation, see Michener and Griswold, 1994a. [Anthidiellum]. Anthidiini.

- Rapanthidium Michener, 1948a:11. Type species: Anthidium vespoides Friese, 1925, by original designation. [Paranthidium]. Anthidiini.
- Raphidostoma Cockerell, 1936a:133. Type species: Raphidostoma ceanothi Cockerell, 1936 = Chelynia rubifloris Cockerell, 1898, by original designation. Isotypic with Chelostomopsis by synonymy. Osmiini.
- Rathymus Smith, 1854:278, not Dejean, 1831, unjustified emendation of *Rhathymus* Lepeletier and Serville, 1828. **Rhathymini.**
- Reanthidium Pasteels, 1969a:87. Type species: Anthidium reticulatum Mocsáry, 1884, by original designation.

 Anthidiini.
- Rediviva Friese, 1911a:671. Type species: Andrena peringueyi Friese, 1911, by designation of Cockerell, 1931a:402. [Andrena]. Melittinae.
- Redivivoides Michener, 1981:42. Type species: Redivivoides simulans Michener, 1981, by original designation. Melittinae.
- Reedapis Michener, 1989:656. Type species: Leioproctus bathycyaneus Toro, 1973, by original designation. [Leioproctus]. Colletinae.
- Reepenia Friese, 1909b:205. Type species: Nomia variabilis Friese, 1909, by designation of Sandhouse, 1943:595, Michener, 1965a:159, and Commission Opinion 788 (1966). The name is not monobasic as indicated by Sandhouse (1943) and by the Offcial List of Generic Names of the International Commission on Zoological Nomenclature, since Friese cited additional species-group names as "varieties" of variabilis. [Nomia]. Nomiinae.
- Rhacandrena LaBerge, 1977:90. Type species: Andrena brevipalpis Cockerell, 1930, by original designation. [Andrena]. Andreninae.
- Rhamphorhina Michener and Sokal, 1957:159, unjustified emendation of Ramphorhina Michener, 1939, lapsus for Arogochila Michener, 1939. [Ashmeadiella]. Osmiini.
- Rhanthidiellum Pasteels, 1972:102, unjustified emendation of Ranthidiellum Pasteels, 1969. [Anthidiellum]. Anthidiini.
- Rhaphandrena LaBerge, 1971b:507. Type species: Andrena prima Casad and Cockerell, 1896, by original designation. [Andrena]. Andreninae.
- Rhathymus Lepeletier and Serville, 1828:448. Type species: Rhathymus bicolor Lepeletier and Serville, 1828, monobasic. Isotypic with Colax; isotypic with Liogastra by synonymy. Rhathymini.
- Rhectomia Moure, 1947a:9. Type species: Rhectomia pumilla Moure, 1947, by original designation. Augochlorini.
- Rhinepeolus Moure, 1955:115. Type species: Epeolus rufiventris Friese, 1908, by original designation. **Epeolini.**
- Rhineta Illiger, 1807:198. Type species: Nomada schottii Fabricius, 1804 = Tiphia brevicornis Panzer, 1798, monobasic. Isotypic with *Biastes* by synonymy. **Biastini.**
- Rhinetula Friese, 1922b:581. Type species: Rhinetula denticrus Friese, 1922, by designation of Sandhouse, 1943:596. Halictini.

- Rhinochaetula Friese, 1912:185. Type species: Capicola cinctiventris Friese, 1912, by designation of Cockerell, 1915:343. Dasypodinae.
- Rhinocoelioxys Mitchell, 1973:113. Type species: Coelioxys zapoteca Cresson, 1878, by original designation. [Coelioxys]. Megachilini.
- Rhinocolletes Cockerell, 1910a:242. Type species: Colletes nasutus Smith, 1853, monobasic. [Colletes]. Colletinae.
- Rhinocorynura Schrottky, 1909a:147. Type species: Halictus inflaticeps Ducke, 1906, by original designation. Isotypic with Ctenocorynura by synonymy. Augochlorini.
- Rhinomegilla Brooks, 1988:482. Type species: Anthophora megarrhina Cockerell, 1910, by original designation. [Anthophora]. Anthophorini.
- Rhodanthidium Isensee, 1927:374. Type species: Anthidium siculum Spinola, 1838, by original designation. [Anthidium]. Anthidiini.
- Rhodobombus Dalla Torre, 1880:40. Type species: Bremus pomorum Panzer, 1804, by designation of Sandhouse, 1943:596. [Bombus]. Isotypic with Pomobombus. Bombini.
- Rhodocentris Friese, 1900:244, 250. Type species: Centris difformis Smith, 1854, by designation of Sandhouse, 1943:596. [Centris]. Isotypic with Heterocentris and Gundlachia by synonymy. Centridini.
- Rhodohylaeus Michener, 1965a:124. Type species: *Prosopis cenibera* Cockerell, 1910, by original designation. [Hylaeus]. **Hylaeinae.**
- Rhodomegachile Michener, 1965a:201. Type species: Megachile abdominalis Smith, 1853, by original designation. [Chalicodoma]. Megachilini.
- Rhodosmia Michener, 1943:85. Type species: Osmia paradoxa Friese, 1899, by original designation. [Anthocopa]. Osmiini.
- Rhogepeolus Moure, 1955:117. Type species: Rhogepeolus bigibbosus Moure, 1955, by original designation. **Epeolini**.
- Rhopalictus Sichel, 1867:146. Type species: Corynura flavofasciata Spinola, 1851 = Halictus chilensis Spinola, 1851, designated by Sandhouse, 1943:596. Augochlorini.
- Rhopalolemma Roig-Alsina, 1991:33. Type species: Rhopalolemma robertsi Roig-Alsina, 1991, by original designation. Biastini.
- Rhopalomelissa Alfken, 1926b:267. Type species: Rhopalomelissa xanthogaster Alfken, 1926, by designation of Sandhouse, 1943:596. Nomiinae.
- Rhophites Agassiz, 1846:29 [Hymenoptera section], unjustified emendation of Rophites Spinola, 1808. Rophitinae.
- Rhophitoides Schenck, 1861:69 (for the date see Michener, 1986a). Type species: Rhophitoides distinguendus Schenck, 1861 = Rhophites cana Eversmann, 1852, monobasic. Rophitinae.
- Rhophitulus Ducke, 1907:366. Type species: Rhophitulus frisei Ducke, 1907, by designation of Sandhouse, 1943:597. Sandhouse corrected the spelling of the species name to friesei but since Ducke used frisei on pages 366 and 368, he must

- have intended that spelling although naming the species for H. Friese. **Panurginae.**
- Rhynchalictus Moure, 1947a:5. Type species: Rhynchalictus rostratus Moure, 1947, by original designation. Halictini.
- Rhynchocolletes Moure, 1943b:447. Type species: Rhynchocolletes albicinctus Moure, 1943, by original designation. Colletinae.
- Rhynostelis Moure and Urban, 1994:297. Type species: Anthidium multiplicatum Smith, 1879, by original designation. Anthidiini.
- Rhysoxylocopa Hurd and Moure. 1963:178. Type species: Xylocopa cantabrita Lepeletier, 1841, by original designation. [Xylocopa]. Xylocopini.
- Rhyssomegachile Mitchell, 1980:63. Type species: Megachile simillima Smith, 1853, by original designation. [Cressoniella].Megachilini.
- Rhyteucera Sitdikov and Pesenko, 1988:87. Type species: Eucera parvula Friese, 1895, by original designation. [Eucera].
- Rivalisia Strand, 1921:270. Type species: Rivalisia metallica Strand, 1921 = ? Augochlora argentina Friese, 1908, monobasic. Augochlorini.
- Robertsonella Titus, 1904a:22. Type species: Robertsonella gleasoni Titus, 1904, by original designation. Osmiini.
- Robustobombus Skorikov, 1922b:157. Type species: Bombus robustus Smith, 1854, by designation of Sandhouse, 1943:597. [Alpigenobombus]. Bombini.
- Rophites Spinola, 1808:8. 72. Type species: Rophites quinquespinosus Spinola, 1808, monobasic. Rophitinae.
- Rostratilapis Friese, 1914b:26. Type species: Halictus macrognathus Friese, 1914, by designation of Sandhouse, 1943:597. [Halictus]. Halictini.
- Rostrohalictus Warncke, 1975b:88. Type species: Halictus longirostris Morawitz, 1876, by original designation. [Halictus]. Halictini.
- Roussyana Manning, 1961:306. Type species: Apis palmnickenensis Roussy, 1937, by original designation. [Electrapis]. Fossil.
- Royanthidium Pasteels, 1969a:86. Type species: Anthidium melanurum Klug, 1832, by original designation. Anthidiini.
- Rubicundobombus Skorikov, 1922b:154. Type species: Bombus rubicundus Smith, 1854, by designation of Sandhouse, 1943:597. [Fervidobombus]. Bombini.
- Ruderariobombus Krüger, 1920:350. Type species: Apis ruderaria Müller, 1776, by designation of Yarrow, 1971:27. [Bombus]. Bombini.
- Rufandrena Warncke, 1968:33. Type species: Andrena rufiventris Lepeletier, 1841, by original designation. [Andrena]. Andreninae.
- Rufipedibombus Skorikov, 1922b:156. Type species: Bombus rufipes Lepeletier, 1836, monobasic. Bombini.
- Rufocinctobombus Frison, 1927:78. Type species: Bombus rufocinctus Cresson, 1863, monobasic. [Bremus]. Bombini.

- Rugalictus Pauly, 1980:121. Type species: Halictus weenenicus Cockerell, 1941 = Halictus retigerus Cockerell, 1940, by original designation. [Pachyhalictus]. Isotypic with Dictyohalictus by synonymy. Halictini.
- Ruginomia Pauly, 1990:103. Type species: Nomia rugiventris Friese, 1930, by original designation. Nomiinae.
- Ruizantheda Moure, 1964b:265. Type species: Halictus proximus Spinola, 1851, by original designation. Halictini.
- Ruizanthedella Moure, 1964b:267. Type species: Halictus mutabilis Spinola, 1851, by original designation. [Ruizantheda]. Halictini.
- Ruizapis Timberlake, 1953:598, emendation of Ruziapis Timberlake, 1952. Panurginae.
- Ruiziella Timberlake, 1952a:105 (April), not Cortes, 1952 (March). Type species: Camptopoeum ochraceum Friese, 1908, by original designation. See Ruziapis and Ruizapis. Isotypic with Arhysosage by synonymy. Panurginae.
- Ruziapis Timberlake, 1952b:528, error for Ruizapis and replacement for Ruiziella Timberlake, 1952. Panurginae.
- Sabulicola Verhoeff, 1890:328. Type species: Sabulicola cirsii Verhoeff, 1890 = Nomada albilabris Fabricius, 1793, monobasic. Halictini.
- Sakagamilla Moure, 1989b:681. Type species: Sakagamilla affabra Moure, 1989, by original designation. Meliponini.
- Salemanthidium Pasteels, 1969a:51. Type species: Hypanthidium salemense Cockerell, 1919, by original designation. [Eoanthidium]. Anthidiini.
- Samba Friese, 1908a:568. Type species: Samba calcarata Friese, 1908, monobasic. **Dasypodinae.**
- Santiago Urban, 1989:117. Type species: Santiago mourei Urban, 1989, by original designation. Eucerini.
- Saranthidium Moure and Hurd, 1960:6. Type species: Anthidium flavopictum Smith, 1854, by original designation; incorrectly stated to be Anthidium furcatum Ducke, 1908, by Griswold and Michener. 1988:321. [Hypanthidium]. Anthidiini.
- Sarocolletes Michener, 1989:643. Type species: Lonchopria rufipennis Cockerell, 1917, by original designation. [Leioproctus]. Colletinae.
- Sarogaster Robertson, 1918a:92, replacement for *Gnathodon* Robertson, 1903. Type species: *Megachile georgica* Cresson, 1878, autobasic. **Megachilini**.
- Saropoda Latreille, 1809:177, unnecessary replacement for Heliophila Klug, 1807. Type species: Apis bimaculata Panzer, 1798, autobasic. Saropoda was named with two included (but synonymous) species; it was also stated to be a replacement for Heliophila Klug. Sandhouse (1943) regarded the fixation as automatic (autobasic) since Heliophila is monobasic. Apis rotundata Panzer, 1798 = A. bimaculata Panzer, 1798, designated by Westwood, 1840a:86, was not originally included in Heliophila. Anthophorini.
- Sayapis Titus, 1906:154, replacement for Gnathocera Provancher, 1882, and Ceratias Robertson, 1903. Type species: Megachile pugnatus Say, 1837, autobasic. Megachilini.

- Scaphandrena Lanham, 1949:200. Type species: Andrena montrosensis Viereck and Cockerell, 1914, by original designation. [Andrena]. Andreninae.
- Scaptotrigona Moure, 1942:315. Type species: Trigona postica Latreille, 1807, by original designation. [Trigona]. Meliponini.
- Scaura Schwarz, 1938:479. Type species: Trigona latitarsis Friese, 1900, by original designation. [Trigona]. Meliponini.
- Schizandrena Hedicke, 1933:218. Type species: Andrena aulica Morawitz, 1876 = Melitta bimaculata Kirby, 1802, by original designation. [Andrena]. Andreninae.
- Schizocoelioxys Mitchell, 1973:50. Type species: Coelioxys funeraria Smith, 1854, by original designation. The spelling Schizococoelioxys in the heading of Mitchell's description (p. 50) is corrected on the same page and elsewhere in the work, [Coelioxys]. Megachilini.
- Schizomegachile Michener, 1965a:199. Type species: Megachile monstrosa Smith, 1868, by original designation. [Chalicodoma]. Megachilini.
- Schmiedeknechtia Friese, 1896:277. Type species: Schmiedeknechtia oraniensis Friese, 1896, monobasic. Ammobatoidini.
- Schoenherria Hurd and Moure, 1963:118, unjustified emendation of Schonnherria Lepeletier, 1841. [Xylocopa]. **Xylocopini.**
- Schonherria Dalla Torre, 1896, 202, unjustified emendation of Schonnherria Lepeletier, 1841. [Xylocopa]. Xylocopini.
- Schonnherria Lepeletier, 1841:207. Type species: Xylocopa micans Lepeletier, 1841, by designation of Sandhouse, 1943:598. [Xylocopa]. Xylocopini.
- Schrottkya Friese, 1908c:170, no included species. Type species: Tetrapedia goeldiana Friese, 1899, first included species, by Friese, 1908b:58. Isotypic with Lanthanomelissa by synonymy. Tapinotaspidini.
- Schrottkyapis Mitchell, 1980:46. Type species: Megachile assumptionis Schrottky, 1908, by original designation. [Eumegachile]. Megachilini.
- Schwarziana Moure, 1943a:147. Type species: Melipona quadripunctata Lepeletier, 1836, by original designation. [Trigona]. Meliponini.
- Schwarzula Moure, 1946a:439. Type species: Trigona timida Silvestri, 1902, by original designation. Meliponini.
- Scirtetica Holmberg, 1903:389, not Saussure, 1884. Type species: Scirtetica antarctica Holmberg, 1903, monobasic. See Alloscirtetica, Holmbergiapis, and Neoscirtetica. Eucerini.
- Scirteticops Moure and Michener, 1955b:261. Type species: Tetralonia gayi Spinola, 1851, by original designation. [Alloscirtetica]. Eucerini.
- Scitandrena Warncke, 1968:51. Type species: Andrena scita Eversmann, 1852, by original designation. [Andrena]. Andreninae.
- Scoliandrena Lanham, 1949:223. Type species: Andrena osmioides Cockerell, 1916, by original designation. [Andrena]. Andreninae.

- Scrapter Lepeletier and Serville, 1828:403, not Scrapter Lepeletier, 1841. Type species: Scrapter bicolor Lepeletier and Serville, 1828, by designation of Vachal, 1897:63. Ashmead's (1899a:84) subsequent designation of Scrapter brullei Lepeletier, 1841, as the type species of "Scrapter Lepel." concerns Scrapter Lepeletier, 1841 (= Panurginus), which was proposed as a new genus, with no reference to Scrapter Lepeletier and Serville, 1828. Cockerell's (1920a:254) subsequent designation of Andrena lagopus Latreille, 1809, as the type species of "Scrapter Lepeletier, 1825" is invalid. Colletinae.
- Scrapter Lepeletier, 1841:260, not Scrapter Lepeletier and Serville, 1828. Type species: Scrapter brullei Lepeletier, 1841, by designation of Ashmead, 1899a:84. Not replaced because a synonym of Panurginus. Panurginae.
- Scrapteroides Gribodo, 1894:112. Type species: Scrapteroides difformis Gribodo, 1894 = Panurgus annulatus Sichel, 1859, monobasic. Panurginae.
- Scrapteropsis Viereck, 1922:42. Type species: Andrena fenningeri Viereck, 1922, monobasic. [Andrena]. Andreninae.
- Seladonia Robertson, 1918a:91. Type species: Apis seladonia Fabricius, 1794, by original designation. Halictini.
- Sellalictus Pauly, 1980:120. Type species: Halictus latesellatus Cockerell, 1937, by original designation. [Lasioglossum]. Halictini.
- Semicarinella Pasteels, 1984:32. Type species: Pseudoanthidium latitarse Pasteels, 1984, by original designation. [Pseudoanthidium]. Anthidiini.
- Senexibombus Frison, 1930:3. Type species: Bombus senex Vollenhoven, 1873. by original designation. [Bremus]. Bombini.
- Separatohombus Frison, 1927:64. Type species: Bombus separatus Cresson, 1863 = Apis griseocollis DeGeer, 1773, by original designation. [Bremus]. Bombini.
- Serapis Smith, 1854:218, not Link, 1830. Type species: Serapis denticulatus Smith, 1854, monobasic. See Serapista. Anthidiini.
- Serapista Cockerell, 1904a:357, replacement for Serapis Smith, 1854. Type species: Serapis denticulatus Smith, 1854, autobasic. Anthidiini.
- Sericogaster Westwood, 1835:71. Type species: Sericogaster fasciatus Westwood, 1835, monobasic. Isotypic with Holohesma by synonymy. Euryglossinae.
- Sericohalictus Pesenko, 1986a:137. Type species: Halictus subopacus Smith, 1853, by original designation. [Lasioglossum]. Halictini.
- Severanthidium Pasteels, 1969a:106. Type species: Anthidium severini Vachal, 1903, by original designation. [Anthidium]. Anthidiini.
- Shornherria Ashmead, 1899a:71, error for Schonnherria Lepeletier, 1841. **Xylocopini.**
- Sibiricibombus Skorikov, 1938a:145, unjustified emendation of Sibiricobombus Vogt, 1911. Bombini.

- Sibiricobombus Vogt, 1911:60. Type species: *Apis sibirica* Fabricius, 1781, by designation of Sandhouse, 1943:599. [Bombus]. **Bombini.**
- Sigmatapis Maa, 1953:556. Type species: Apis cerana Fabricius, 1793, by original designation. [Apis]. Apini.
- Simandrena Pérez, 1890:174. Type species: Andrena propinqua Schenek, 1851 = Melitta dorsata Kirby, 1802, by designation of Hedicke, 1933:218. [Andrena]. Andreninae.
- Simanthedon Zavortink, 1975:232. Type species: Simanthedon linsleyi Zavortink, 1975, by original designation. Eucerini.
- Simcolletes Warncke, 1978:348. Type species: Colletes similis Schenck, 1853, by original designation. [Colletes]. Colletinae.
- Simioceratina Daly and Moure, 1988, in Daly, 1988:42. Type species: Ceratina moerenhouti Vachal, 1903, by original designation. [Ctenoceratina]. Ceratinini.
- Simpanurgus Warncke, 1972:67. Type species: Panurgus phyllopodus Warncke, 1972, by original designation. [Panurgus]. Panurginae.
- Sinomacropis Michener, 1981:51. Type species: Macropis hedini Alfken, 1936, by original designation. [Macropis]. Melittinae.
- Smeathhalictus Warncke, 1975b:88. Type species: Melitta smeathmanella Kirby, 1802, by original designation. [Halictus]. Halictini.
- Smithia Vachal, 1897:63, not Milne-Edwards, 1851. Type species: Scrapter carinata Smith, 1862, by designation of Cockerell, 1910b:358. See Melittosmithia. Euryglossinae.
- Solamegilla Marikovskaya, 1980:650. Type species: Anthophora prshewalskyi Morawitz, 1880, by original designation. Anthophorini.
- Solenopalpa Pérez, 1897a:1xvii; also described as new by Pérez, 1897b:260. Type species: Solenopalpa fertoni Pérez, 1903 (not Andrena fertoni Pérez, 1895) = Andrena solenopalpa Benoist, 1945, monobasic, Andreninae.
- Sophrobombus Cockerell, 1908d:326; also described as new by Cockerell, 1909g:21. Type species: Sophrobombus fatalis Cockerell, 1908, monobasic. Fossil.
- Soroeensibombus Vogt, 1911:63. Type species: Apis soroeensis Fabricius, 1776, monobasic. [Bombus]. Isotypic with Kallobombus. Bombini.
- Spatularia Méhelÿ, 1935:69, 175, not Van Deventer, 1904. Invalid because no type species was designated. [Prosopis]. See Spatulariella. Hylaeinae.
- Spatulariella Popov, 1939:169, replacement for Spatularia Méhelÿ, 1935. Type species: *Hylaeus hyalinatus* Smith, 1842, by original designation. [Prosopis]. **Hylaeinae.**
- Spatunomia Pauly, 1980:121. Type species: Nomia filifera Cockerell, 1932, by original designation. [Nomia]. Nomiinae.
- Sphaerhylaeus Cockerell, 1929a:217. Type species: Gnathoprosopis globulifera Cockerell, 1929, by original designation. [Gnathoprosopis]. **Hylaeinae.**
- Sphecodes Latreille, 1804:182. Type species: Nomada gibba Fabricius, 1804 = Sphex gibba Linnaeus, 1758, monobasic. Isotypic with Dichroa. Halictini.

- Sphecodium Robertson, 1903b:104. Type species: Sphecodium cressonii Robertson, 1903, by original designation. Halictini.
- Sphecodogastra Ashmead, 1899a:92. Type species: Sphecodes texana Cresson, 1872, by original designation. Halictini.
- Sphecodopsis Bischoff, 1923:593. Type species: Omachthes capicola Strand, 1911, by original designation. Ammobatini.
- Sphecodosoma Crawford, 1907:182. Type species: Sphecodosoma pratti Crawford, 1907, by original designation. Rophitinae.
- Sphecogaster Hirashima, 1978:72, not Lacordaire, 1869. Type species: *Palaeorhiza paradisea* Hirashima, 1978, by original designation. See *Eusphecogastra*. [Palaeorhiza]. **Hylaeinae**.
- Sphecophala Ashmead, 1899a:89, unjustified replacement for Sphegocephala Saussure, 1890. Type species: Sphegocephala philanthoides Saussure, 1890, autobasic. Nomiinae.
- Sphegocephala Saussure, 1890:74. Type species: Sphegocephala philanthoides Saussure, 1890, monobasic. Nomiinae.
- Sphegodes Mavromoustakis, 1949:553, unjustified emendation of Sphecodes Latreille, 1804. Halictini.
- Spinanthidiellum Pasteels, 1969a:59. Type species: Anthidium volkmanni Friese, 1909, by original designation. [Spinanthidium]. Anthidiini.
- Spinanthidium Mavromoustakis, 1951:977. Type species: Anthidium trachusiforme Friese, 1913, by original designation. [Dianthidium]. Anthidiini.
- Spinasternella Gupta and Sharma, 1993, in Gupta, 1993:104. Type species: Spinasternella mervatus Gupta and Sharma, 1993, by original designation. Osmiini.
- Spinolapis Moure, 1951c:193, replacement for *Pasiphae* Spinola, 1851. Type species: *Pasiphae caerulescens* Spinola, 1851, by original designation and autobasic. **Colletinae.**
- Spinoliella Ashmead, 1899a:84. Type species: Camptopoeum nomioides [sic] Spinola = Camptopoeum nomadoides Spinola, 1851, by original designation. Panurginae.
- Spinopasites Warncke, 1983:281. Type species: Pasites spinotus Warncke, 1983, by original designation. [Pasites]. Ammobatini.
- Steganomus Ritsema, 1873:224. Type species: Steganomus javanus Ritsema, 1873, monobasic. Nomiinae.
- Stegocephala Dalla Torre, 1896:176, unjustified emendation of Sphegocephala Saussure, 1890. Nomiinae.
- Stelidiella Timberlake, 1941:133, lapsus for Stelidina Timberlake, 1941. [Stelis]. Anthidiini.
- Stelidina Timberlake, 1941:131. Type species: Stelis hemirhoda Linsley, 1939, by original designation. [Stelis]. Anthidiini.
- Stelidium Robertson, 1902b:323. Type species: Stelidium trypetinum Robertson, 1902, monobasic. The subsequent designation, Robertson, 1903b:104, of "S. cressonii Robertson" as the type species of "Stelidium" was a lapsus; the intention was to designate that species as the type of Sphecodium. Anthidiini.
- Stelidium Robertson, 1903b:104, lapsus for Sphecodium; this is not Stelidium Robertson, 1902b. Type species: Sphecodium cressonii Robertson, 1903, by original designation. Halictini.

- Stelidomorpha Morawitz, 1875:131. Type species: Anthidium nasutum Latreille, 1809, monobasic. Anthidiini.
- Stelis Panzer, 1806:246. Type species: Apis aterrima Panzer, 1798, not Christ, 1791 = Apis punctulatissima Kirby, 1802, monobasic. Isotypic with Trachusa Jurine, Gyrodroma Klug, Gymnus, and Ceraplastes. Anthidiini.
- Stellenigris Meunier, 1888:152. Type species: Stellenigris vandeveldi Meunier, monobasic. Megachilini.
- Stelodides Moure, 1953c:123. Type species: Megachile euzona Pérez, 1899, by original designation. Megachilini.
- Stenandrena Timberlake, 1949, in Lanham, 1949:213. Type species: *Pterandrena pallidifovea* Viereck, 1904, by original designation. [Andrena]. **Andreninae.**
- Stenanthidiellum Pasteels, 1968a:1059. Also described as new by Pasteels, 1969a:53. Type species: Anthidium sibiricum Eversmann, 1852, by original designation. [Bathanthidium]. Anthidiini.
- Stenanthidium Moure, 1947a:16. Type species: Anthidium espinosai Ruiz, 1938, by original designation. Anthidiini.
- Stenocolletes Schrottky, 1909c:253. Type species: Stenocolletes pictus Schrottky, 1909, monobasic. Panurginae?
- Stenoediscelis Toro and Moldenke, 1979:135. Type species: Oediscelis inermis Friese, 1908, by original designation. **Xeromelissinae.**
- Stenoheriades Tkalců, 1984a:1. Type species: Pseudoheriades hofferi Tkalců, 1984, by original designation. [Pseudoheriades]. Osmiini.
- Stenohesma Michener, 1965a:99. Type species: Stenohesma nomadiformis Michener, 1965, by original designation. Euryglossinae.
- Stenomegachile Pasteels, 1965:507. Type species: Megachile chelostomoides Gribodo, 1894, by original designation. [Chalicodoma]. Megachilini.
- Stenomelissa Hirashima and LaBerge, 1965, in Hirashima, 1965b:500. Type species: Andrena halictoides Smith, 1869, by original designation. [Andrena]. Andreninae.
- Stenosmia Michener, 1941:165. Type species: Osmia flavicornis Morawitz, 1878, by original designation. Osmiini.
- Stenothisa Moure, 1954b:277. Type species: Doeringiella angustata Moure, 1954, by original designation. [Doeringiella]. Epcolini.
- Stenotritus Smith, 1853:119. Type species: Stenotritus elegans Smith, 1853, monobasic. Stenotritidae.
- Stenoxylocopa Hurd and Moure, 1960:809. Type species: Xylocopa artifex Smith, 1874, by original designation. [Xylocopa]. Xylocopini.
- Stictonomia Cameron, 1905:192. Type species: Stictonomia punctata Cameron, 1905, monobasic. Nomiinae.
- Stilbeucera Tkalců, 1978:162. Type species: Eucera clypeata Erichson, 1835, by original designation. [Eucera]. Eucerini.
- Stilbomalopsis Silveira, 1995:450. Type species: Exomalopsis solani Cockerell, 1896, by original designation. [Exomalopsis]. Exomalopsini.

- Stilpnosoma Smith, 1879:16. Type species: Stilpnosoma laevigatum Smith, 1879, monobasic. Euryglossinae.
- Strandiella Friese, 1912:181. Type species: Strandiella longula Friese, 1912, by designation of Cockerell, 1916a:430. Colletinae.
- Suandrena Warncke, 1968:52. Type species: Andrena suerinensis Friese, 1884, by original designation. [Andrena]. Andreninae.
- Subterraneibombus Skorikov, 1938a:145, unjustified emendation of Subterraneobombus Vogt, 1911. **Bombini.**
- Subterraneobombus Vogt, 1911:62. Type species: Apis subterranea Linnaeus, 1758, by designation of Frison, 1927:68. [Bombus]. Bombini.
- Sudila Cameron, 1898:52. Type species: Sudila bidentata Cameron, 1898, by designation of Sandhouse, 1943:602. Isotypic with Ceylonicola by synonymy. Halictini.
- Sulcobombus Krüger, 1917:65. Type species: Bombus confusus Schenck, 1859, designated by Sandhouse, 1943:502. This was a sectional name, but is treated as a subgeneric name in view of the Code, 3rd ed., art 10(e). [Bombus]. Isotypic with Confusibombus and Confusobombus. Bombini.
- Sundatrigona Inoue and Sakagami, 1993:769, replacement for Trigonella Sakagami and Moure, 1975. Type species: Trigona moorei Schwarz, 1937, by original designation and autobasic. [Trigona]. Meliponini.
- Svastra Holmberg, 1884:127. Type species: Svastra bombilans Holmberg, 1884, by designation of Sandhouse, 1943:602. Eucerini.
- Svastrides Michener, LaBerge, and Moure, 1955:220. Type species: *Tetralonia melanura* Spinola, 1851, by original designation. Eucerini.
- Svastrina Moure and Michener, 1955b:276. Type species: Svastrina anaroliata Moure and Michener, 1955 = Svastra subapicalis Brèthes, 1910, by original designation. Eucerini.
- Svastropsis Moure and Michener, 1955b:291. Type species: Tetralonia bipunctata Friese, 1908, by original designation. [Martinapis]. Eucerini.
- Symmorpha Klug, 1807, in Illiger, 1807:198, nomen nudum. Melectini.
- Symmorpha Klug, 1807b:227. Type species: Apis punctata Fabricius, 1775 = Apis albifrons Forster, 1771, monobasic. 1sotypic with Melecta. Melectini.
- Synalonia Robertson, 1905:365, unjustified emendation of Synhalonia Patton, 1879. Eucerini.
- Synapis Cockerell, 1907a:229. Type species: Apis henshawi Cockerell, 1907, monobasic. [Apis]. Fossil. Apini.
- Synepeolus Cockerell, 1921b:6. Type species: *Triepeolus insolitus* Cockerell, 1921, monobasic. [Triepeolus]. **Epeolini.**
- Synhalonia Patton, 1879a:473. Type species: Melissodes fulvitarsis Cresson, 1878, by original designation. Eucerini.
- Synocoelioxys Mitchell, 1973:57. Type species: Coelioxys texana Cresson, 1872, by original designation. [Coelioxys]. Megachilini.

- Syntrichalonia LaBerge, 1957:10. Type species: Melissodes exquisita Cresson, 1878, by original designation. Eucerini.
- Systropha Illiger, 1806:145. Type species: Andrena spiralis Olivier, 1789 = Eucera curvicornis Scopoli, 1770, monobasic. Rophitinae.
- Systrophidia Cockerell, 1936b:477. Type species: Systropha ogilviei Cockerell, 1936, monobasic. [Systropha]. Rophitinae.
- Tachymelissodes LaBerge, 1956:1170. Type species: Melissodes dagosa Cockerell, 1909, by original designation. [Melissodes]. Eucerini.
- *Taeniandrena* Hedicke, 1933:219. Type species: *Melitta ovatula* Kirby, 1802, by original designation. [Andrena]. **Andreninae.**
- Tanguticobombus Pittioni, 1939:201. Type species: Bombus tanguticus Morawitz, 1886, by original designation. [Bombus]. Bombini.
- Tapinorhina Michener and Moure, 1957:421. Type species: Exomalopsis caerulea Friese, 1906, by original designation. [Tapinotaspis]. **Tapinotaspidini.**
- *Tapinorrhina* Moure, 1994a:274, unjustified emendation of *Tapinorhina* Michener and Moure, 1957. **Tapinotaspidini**.
- *Tapinotapsis* [sic] Holmberg, 1887b:225, nomen nudum. **Tapinotaspidini.**
- Tapinotaspis Holmberg, 1903:413. Type species: Tapinotaspis chacabucensis Holmberg, 1903 = Exomalopsis chalybaea Friese, 1899, by designation of Sandhouse, 1943:603. **Tapinotaspidini.**
- Tapinotaspoides Moure, 1944b:10. Type species: Tetrapedia serraticornis Friese, 1899, by original designation. Tapinotaspidini.
- Tarsalia Morawitz, 1895:9. Type species: Tarsalia hirtipes Morawitz, 1895, monobasic. Ancylini.
- *Tarsandrena* Osychnyuk, 1984a:24. Type species: *Andrena tarsata* Nylander, 1848, by original designation. [Andrena]. **Andreninae.**
- Teleutemnesta Holmberg, 1887b:225, nomen nudum. Emphorini.
- *Teleutenmesta* Holmberg, 1903:400. Type species: *Teleutenmesta fructifera* Holmberg, 1903, by designation of Cockerell, 1918b:36. **Emphorini.**
- Temnosoma Smith, 1853:38. Type species: Temnosoma metallicum Smith, 1853, monobasic. Augochlorini.
- Temnosomula Ogloblin, 1953:2. Type species: Temnosoma platensis Ogloblin, 1953 = Micraugochlora sphaerocephala Schrottky, 1909, by original designation. [Temnosoma]. Isotypic with Micraugochlora by synonymy. Augochlorini.
- Teratognatha Ogloblin, 1956:154. Type species: Teratognatha modesta Ogloblin, 1956, by original designation. Exomalopsini.
- *Tergosmia* Warncke, 1988a:390. Type species: *Osmia tergestensis* Ducke, 1897, by original designation. [Osmia]. **Osmiini.**
- *Terrestribombus* Vogt, 1911:55. Type species: *Apis terrestris* Linnaeus, 1758, by designation of Frison, 1927:67. [Bombus].

- Isotypic with *Bremus* Jurine, *Bremus* Panzer, *Bombus*, and *Leucobombus*. **Bombini.**
- Tetrachlora Schrottky, 1909b:481. Type species: Halictus multiplex Vachal, 1903, monobasic. [Augochlora]. Augochlorini.
- Tetraglossula Ogloblin, 1948:165. Type species: Tetraglossula deltivaga Ogloblin, 1948, by original designation. Colletinae.
- Tetragona Lepeletier and Serville, 1828:710. Type species: Trigona elongata Lepeletier and Serville, 1828 = Centris clavipes Fabricius, 1804, by original designation. [Trigona]. Meliponini.
- Tetragonilla Moure, 1961:210. Type species: Trigona atripes Smith, 1857, by original designation. Meliponini.
- Tetragonisca Moure, 1946a:438. Type species: Trigona jaty Smith, 1863 = Trigona angustula Latreille, 1811, by original designation. **Meliponini.**
- Tetragonula Moure, 1961:206. Type species: Trigona iridipennis Smith, 1854, by original designation. Meliponini.
- Tetralonia Spinola, 1838:538, replacement for Macrocera Latreille, 1810. Type species: Eucera antennata Fabricius, 1793 = Apis malvae Rossi, 1790, autobasic. See Michener, 1997. Eucerini.
- Tetraloniella Ashmead, 1899a:61. Type species: Macrocera graja Eversmann, 1852, by original designation. Eucerini.
- Tetralonioidella Strand, 1914 (Apr.–May):140. Type species: Tetralonia (?) hoozana Strand, 1914, monobasic. Isotypic with Protomelissa by synonymy. Melectini.
- Tetranthidium Moure, 1947a:15. Type species: Anthidium latum Schrottky, 1902, by original designation. Anthidiini.
- Tetrapaedia Dalla Torre, 1896:299, unjustified emendation of Tetrapedia Klug, 1810. Tetrapediini.
- *Tetrapedia* Klug, 1810:33. Type species: *Tetrapedia diversipes* Klug, 1810, monobasic. **Tetrapediini.**
- *Tetrapedium* Berthold, 1827:468, unjustified emendation of *Tetrapedia* Klug, 1810. **Tetrapediini.**
- Tetraperdita Cockerell and Porter, 1899:415. Type species: Perdita sexmaculata Cockerell, 1895, monobasic. [Perdita]. Panurginae.
- Tetrigona Moure, 1961:215. Type species: Trigona apicalis Smith, 1857, by original designation. Meliponini.
- Thalestria Smith, 1854:283. Type species: Thalestria smaragdina Smith, 1854 = Euglossa spinosa Fabricius, 1804, monobasic. Epeolini.
- Thaumatosoma Smith, 1865:394. Type species: Thaumatosoma duboulaii Smith, 1865, monobasic. Megachilini.
- Thectochlora Moure, 1940:51. Type species: Halictus alaris Vachal, 1904, by original designation. Augochlorini.
- Thoracobombus Dalla Torre, 1880:40. Type species: Apis sylvarum Linnaeus, 1761, by designation of Sandhouse, 1943:604. [Bombus]. Isotypic with Adventoribombus. Bombini.
- Thrausmus Buysson, 1900:177. Type species: Thrausmus grandidieri Buysson, 1900, monobasic. Halictini.

- Thrinchostoma Saussure, 1890:52. Type species: Thrinchostoma renitantely Saussure, 1890, monobasic. Halictini.
- Thrincohalictus Blüthgen, 1955:20. Type species: Halictus prognathus Pérez, 1912, by original designation. [Halictus]. Halictini.
- *Thrincostoma* Dalla Torre, 1896:641, also Blüthgen, 1926. 1928b, 1930, unjustified emendation of *Thrinchostoma* Saussure, 1890. **Halictini.**
- Thygater Holmberg, 1884:133. Type species: Tetralonia terminata Smith, 1854 = Macrocera analis Lepeletier, 1841, monobasic. Eucerini.
- Thygatina Cockerell, 1911f:237. Type species: Thygatina fumida Cockerell, 1911, monobasic. Eucerini.
- Thyreothremma Holmberg, 1903:391. Type species: Thyreothremma rhopalocera Holmberg, 1903 = Melissoptila tandilensis Holmberg, 1884, by designation of Sandhouse, 1943:604. Isotypic with Thyreotremata; isotypic with Melissoptila by synonymy. Eucerini.
- Thyreotremata Holmberg, 1887b:225, nomen nudum. Eucerini.
- Thyreotremata Sandhouse, 1943:604. Type species: Thyreothremma rhopalocera Holmberg, 1903 = Melissoptila tandilensis Holmberg, 1884, by designation of Moure and Michener, 1955b:305. Published as a junior synonym and therefore not available according to the Code, 3rd ed., Art. 11(e). See Moure and Michener, 1955b:305 footnote. Isotypic with Thyreothremma; isotypic with Melissoptila by synonymy. Eucerini.
- Thyreus Panzer, 1806:263. Type species: Nomada scutellaris Fabricius, 1781, monobasic. Isotypic with Crocissa. Melectini.
- Thysandrena Lanham, 1949:213. Type species: Andrena candida Smith, 1879, by original designation. [Andrena]. Andreninae.
- Titusella Cockerell, 1906e:445. Type species: Titusella pronitens Cockerell, 1906, monobasic. Osniini.
- Tmetocoelia Moure, 1943b:481. Type species: Megalopta sulciventris Friese, 1926, by original designation. Augochlorini.
- Torocolletes Michener, 1989:651. Type species: Lonchopria fazii Herbst, 1923, by original designation. [Leioproctus]. Colletinae.
- Torridapis Pasteels, 1977:195. Type species: Coelioxys torrida Smith, 1854, by original designation. [Liothyrapis]. Megachilini.
- Townsendiella Crawford, 1916:136, 138. Type species: Townsendiella pulchra Crawford, 1916, monobasic. Townsendiellini.
- *Trachandrena* Robertson, 1902a:187, 189. Type species: *Andrena rugosa* Robertson, 1891, by original designation. **Andreninae.**
- Trachina Klug, 1807b:226. Type species: Centris longimana Fabricius, 1804, by designation of Cockerell. 1906d:105. Centridini.

- *Trachusa* Jurine, 1801:164, not Panzer, 1804. Type species: *Apis aterrima* Panzer, 1798, by designation of Morice and Durrant, 1915:426. Suppressed by Commission Opinion 135 (1939), Direction 4. Isotypic with *Stelis, Gyrodroma* Klug, *Gymnus*, and *Ceraplastes*. **Anthidiini**.
- Trachusa Panzer, 1804b:expl. pl. 14-15. Type species: Trachusa serratulae Panzer, 1804 = Apis byssina Panzer, 1798, by designation of Sandhouse, 1943:605. Isotypic with Megachileoides; isotypic with Diphysis by synonymy. Anthidiini.
- *Trachusoides* Michener and Griswold, 1994a:324. Type species: *Trachusoides simplex* Michener and Griswold, 1994, by original designation. **Anthidiini.**
- *Trachusomimus* Popov, 1964:406. Type species: *Trachusa perdita* Cockerell, 1904, by original designation. **Anthidiini.**
- Trachyrhiza Hirashima, 1980:100. Type species: Palaeorhiza rugosa Hirashima, 1980, by original designation. [Palaeorhiza]. Hylaeinae.
- Trianthidiellum Pasteels, 1969a:58. Type species: Hypanthidium sheppardi Mavromoustakis, 1937, by original designation. Anthidiini.
- Trianthidium Mavromoustakis, 1958:435. Type species: Anthidium caturigense Giraud, 1863, by original designation. [Rhodanthidium]. Anthidiini.
- *Trichanthidiodes* Michener and Griswold, 1994a:319. Type species: *Pachyanthidium semiluteum* Pasteels, 1984, by original designation. [Pachyanthidium]. **Anthidiini.**
- Trichanthidium Cockerell, 1930b:52. Type species: Pachyanthidium occipitale Cockerell, 1930 = Anthidium benguelense Vachal, 1903, monobasic. [Pachyanthidium]. Anthidiini.
- Trichanthidium Moure, 1947a:20, not Cockerell, 1930. Type species: Anthidium subpetiolatum Schrottky, 1910, by original designation. See Anthidianum. Anthidiini.
- *Trichchostoma* Ashmead, 1899a:91, error for *Thrinchostoma* Saussure, 1890. **Halictini.**
- *Trichinosmia* Sinha, 1958:244. Type species: *Osmia latisulcata* Michener, 1936, by original designation. [Osmia]. **Osmiini.**
- Trichocentris Snelling, 1956:4. Type species: Centris rhodoleuca Cockerell, 1923 = Centris caesalpiniae var. rhodopus Cockerell, 1897, by original designation. Centridini.
- *Trichocerapis* Cockerell, 1904b:292. Type species: *Tetralonia mirabilis* Smith, 1865, by original designation. **Eucerini**.
- Trichocolletes Cockerell, 1912:176. Type species: Lamprocolletes venustus Smith, 1862, by original designation. Colletinae.
- *Tricholiphanthus* Ruz and Toro, 1983:267. Type species: *Liphanthus leucostomus* Ruz and Toro, 1983, by original designation. [Liphanthus]. **Panurginae.**
- Trichonomada Michener, 1996:90. Type species: Trichonomada roigella Michener, 1996, by original designation. Brachynomadini.

- Trichopasites Linsley, 1942:127. Type species: Neopasites insoletus Linsley, 1942, by original designation. [Neopasites]. Ammobatoidini.
- Trichorhopalomelissa Wu, 1985:58. Type species: Rhopalomelissa hainanensis Wu, 1985, by original designation. [Rhopalomelissa]. **Nomiinae.**
- Trichostoma Dalla Torre, 1896:381, also Friese, 1909a:150, unjustified emendation of Thrinchostoma Saussure, 1890. Halictini.
- *Trichota* Méhelÿ, 1935:63, 169. Invalid because no type species was designated. [Prosopis]. Sandhouse's (1943:606) view that Popov, 1939:169, designated a type species and thus validated the name is incorrect. **Hylaeinae.**
- Trichothurgus Moure, 1949b:270. Type species: Megachile dubia Sichel, by original designation. Trichothurgus and Lithurgomma Moure were published simultaneously. Michener (1983), as first reviser, selected Trichothurgus as the generic name when they are considered synonymous. Lithurgini.
- Trichotosmia Tkalců, 1980:16. Type species: Wainia consimilis Tkalců, 1980, by original designation. [Wainia]. Osmiini.
- *Trichotrigona* Camargo and Moure, 1983:421. Type species: *Trichotrigona extranea* Camargo and Moure, 1983, by original designation. **Meliponini.**
- Trichurochile Mitchell, 1980:63. Type species: Megachile thygaterella Schrottky, 1913, by original designation. [Cressoniella]. Megachilini.
- *Tricornibombus* Skorikov, 1922b:151. Type species: *Bombus tricornis* Radoszkowsky, 1888, monobasic. [Agrobombus]. **Bombini.**
- *Tridentosmia* Schmiedeknecht, 1885:21. Type species: *Osmia tridentata* Dufour and Perris, 1840, by designation of Michener, 1941:159. [Osmia]. **Osmiini.**
- *Triepeolus* Robertson, 1901:231. Type species: *Epeolus concavus* Cresson, 1878, by original designation. Epeolini.
- *Triepicharis* Moure, 1945b:304. Type species: *Epicharis analis* Lepeletier, 1841, by original designation. **Centridini.**
- *Trigona* Jurine, 1807:245. Type species: *Apis amalthea* Olivier, 1789, by designation of Latreille, 1810:439. **Meliponini.**
- *Trigonella* Sakagami and Moure, 1975, *in* Sakagami, 1975:57, not da Costa, 1778. Type species: *Trigona moorei* Schwarz, 1937, monobasic. See *Sundatrigona*. **Meliponini**.
- Trigonisca Moure, 1950a:249. Type species: Trigona duckei Friese, 1900, by original designation. [Hypotrigona]. **Meliponini.**
- Trigonopedia Moure, 1941b:518. Type species: Trigonopedia oligotricha Moure, 1941, by original designation. Tapinotaspidini.
- *Trilia* Vachal, 1899:534. Type species: *Dufourea muoti* Vachal, 1899, monobasic. [Dufourea]. **Rophitini.**
- *Trinchostoma* Sandhouse, 1943:606, incorrectly attributed to Sladen, 1915:214, unjustified emendation of *Thrinchostoma* Saussure, 1890. **Halictini.**

- *Trinomia* Pauly, 1980:122. Type species: *Nomia tridentata* Smith, 1875, by original designation. [Nomia]. **Nominae.**
- Triopasites Linsley, 1939b:8. Type species: Triopasites timberlakei Linsley, 1939, by original designation. Brachynomadini.
- Troandrena Warncke, 1974:108, nomen nudum. [Andrena]. Andreninae.
- Troandrena Warncke, 1975a:81. Type species: Andrena troodica Warncke, 1975, by original designation. [Andrena]. Andreninae.
- *Tropandrena* Viereck, 1924:21. Type species: *Andrena fragilis* Smith, 1853, by original designation. [Andrena]. **Andreninae.**
- Trophocleptria Holmberg, 1886b:233, 275. Type species: Trophocleptria variolosa Holmberg, 1886, monobasic. Epeolini.
- Tropicocoelioxys Gupta, 1991:425. Type species: Coelioxys genoconcavitus Gupta, 1991, by original designation. [Coelioxys]. Megachilini.
- Tropidopedia Michener and Moure, 1957:411. Type species: Paratetrapedia seabrai Michener and Moure, 1957, by original designation. [Paratetrapedia]. Tapinotaspidini.
- Tropirhopalomelissa Wu, 1985:58. Type species: Rhopalomelissa nigra Wu, 1985, by original designation. [Rhopalomelissa]. Nomiinae.
- Truncandrena Warncke, 1968:46. Type species: Andrena truncatilabris Morawitz, 1878, by original designation. [Andrena]. Andreninae.
- Trypetes Schenck, 1861:32, 89. [For the date, see Michener, 1986a.] Type species: Apis truncorum Linnaeus, 1758, monobasic. Isotypic with Heriades. Osmiini.
- Tuberanthidium Pasteels, 1969a:87. Type species: Anthidium tuberculiferum Brauns, 1905, by original designation. Anthidiini.
- Tumidihesma Exley, 1996:253. Type species: Tumidihesma tridentata Exley, 1996, by original designation. Euryglossinae.
- Turkanthidium Pasteels, 1969a:103. Type species: Anthidium unicum Morawitz, 1875, by original designation. [Anthidium]. Anthidiini.
- Turnerella Cockerell, 1910c:262. Type species: Turnerella gilberti Cockerell, 1910, monobasic. Euryglossinae.
- Tylandrena LaBerge, 1964:312. Type species: Cilissa erythrogaster Ashmead, 1890, by original designation. [Andrena]. Andreninae.
- Tylanthidium Urban, 1994a:277. Type species: Tylanthidium tuberigaster Urban, 1994, by original designation. Anthidiini.
- Tylomegachile Moure, 1953c:120. Type species: Megachile orba Schrottky, 1913, by original designation. [Megachile]. Megachilini.
- Tytthalictus Pesenko, 1984:348. Type species: Halictus maculatus Smith, 1848, by original designation. [Halictus]. Halictinae.

- Ulandrena Warncke, 1968:43. Type species: Andrena schulzi Strand, 1921, by original designation. [Andrena]. Andreninae.
- *Ulanthidium* Michener, 1948a:13. Type species: *Ulanthidium mitchelli* Michener, 1948, by original designation. **Anthidiini.**
- Uncobombus Krüger, 1917:65. Type species: Apis hypnorum Linnaeus, 1758, by designation of Williams, 1991:69. A sectional name, treated as a genus-group name in view of the Code, 3rd ed., Art. 10(e). Krüger attributed the name to Vogt but Krüger evidently wrote the text of the paper. [Bombus]. Isotypic with Pyrobombus, Anodontobombus, and Hypnorobombus. Bombini.
- Urocolletes Michener, 1965a:58. Type species: Leioproctus rhodurus Michener, 1965, by original designation. [Leioproctus]. Colletinae.
- Urohalictus Michener, 1980:16. Type species: Urohalictus lieftincki Michener, 1980, by original designation. Halictini.
- Uromonia Michener, 1981:23. Type species: Uromonia stagei Michener, 1981, by original designation. Meganomiinae.
- Verbenapis Cockerell and Atkins, 1902:44. Type species: Calliopsis verbenae Cockerell and Porter, 1899, monobasic. [Calliopsis]. Panurginae.
- Vestitohalictus Blüthgen, 1961:287. Type species: Halictus vestitus Lepeletier, 1841, by original designation. [Halictus]. Halictini.
- Viereckella Swenk, 1907:298. Type species: Viereckella obscura Swenk, 1907 = Nomada pilosula Cresson, 1878, by original designation. Osirini.
- Viridosmia Warncke, 1988b:5. Type species: Osmia saxicola Ducke, 1899, by original designation. [Osmia]. Osmiini.
- Volucellobombus Skorikov, 1922b:123, 149. Type species: Bombus volucelloides Gribodo, 1891, monobasic. Bombini.
- Wagenknechtia Moure, 1950c:389. Type species: Centris cineraria Smith, 1854, by original designation. [Centris]. Centridini.
- Wainia Tkalců, 1980:1. Type species: Wainia lonavlae Tkalců, 1980, by original designation. **Osmiini.**
- Warnckeia Pagliano and Scaramozzino, 1990:6, replacement for Melanthidium Pasteels, 1969. Type species: Anthidium concolor Friese, 1913, autobasic. Anthidiini.
- Willinkapis Moure, 1953a:66. Type species: Ptiloglossa chalybaea Friese, 1906, by original designation. Caupolicanini.
- Xanthandrena Lanham, 1949:218. Type species: Andrena auricoma Smith, 1879, by original designation. [Andrena]. Andreninae.
- Xanthemisia Moure, 1945c:401. Type species: *Centris bicolor* Lepeletier, 1841, by original designation. **Centridini.**
- Xanthepicharis Moure, 1945b:297. Type species: Epicharis bicolor Smith, 1854, by original designation. Centridini.
- Xanthesma Michener, 1965a:97. Type species: Euryglossa furcifera Cockerell, 1913, by original designation. Euryglossinae.

- Xanthidium Robertson, 1903d:174, 175, 177, not Ehrenberg, 1833. Type species: *Nomada luteola* Olivier, 1811, by original designation. This name is preoccupied but since it is a synonym of *Nomada*, it has not been replaced. **Nomadini.**
- Xanthoceratina Vecht, 1952:39. Type species: Ceratina cladura Cockerell, 1919, by original designation. [Ceratina]. Ceratinini.
- Xanthocotelles Toro and Cabezas, 1978:131. Type species: Xanthocotelles adesmiae Toro and Cabezas, 1978, by original designation. Colletinae.
- Xanthopedia Michener and Moure, 1957:411. Type species: Paratetrapedia tricolor Michener and Moure, 1957 = Tetrapedia iheringii Friese, 1899, by original designation. [Paratetrapedia]. **Tapinotaspidini.**
- Xanthosarus Robertson, 1903a:168, 169, 172. Type species: Megachile latimanus Say, 1823, by original designation. Isotypic with Delomegachile by synonymy. Megachilini.
- Xanthosmia Robertson, 1903a:166, 171. Type species: Osmia cordata Robertson, 1902, by original designation. Osmiini.
- Xenanthidium Pasteels, 1984:33. Type species: Xenanthidium biserratum Pasteels (described as biserrata), 1984, by original designation. Anthidiini.
- Xenochalicodoma Tkalců, 1971:34, replacement for Parachalicodoma Tkalců, 1969. Type species: Chalicodoma rufitarsis Lepeletier, autobasic. [Chalicodoma]. Megachilini.
- Xenochilicola Toro and Moldenke, 1979:145. Type species: Xenochilicola mamigna Toro and Moldenke, 1979, by original designation. Xeromelissinae.
- Xenoglossa Smith, 1854:315. Type species: Xenoglossa fulva Smith, 1854, monobasic. Eucerini.
- Xenoglossodes Ashmead, 1899a:63. Type species: Melissodes albata Cresson, 1872, by original designation. Eucerini.
- Xenohesma Michener, 1965a:96. Type species: Euryglossa flavicauda Michener, 1965, by original designation. [Euryglossa]. Euryglossinae.
- Xenohylaeus Michener, 1965a:136. Type species: Hylaeus rieki Michener, 1965, by original designation. [Hylaeus]. Hylaeinae.
- Xenoliphanthus Ruz and Toro, 1983:260. Type species: Psaenythia parvula Friese, 1916, by original designation. [Liphanthus]. Panurginae.
- Xenomegachile Rebmann, 1970:44. Type species: Megachile albocincta Radoszkowski, 1874, by original designation. [Megachile]. Megachilini.
- *Xenopanurgus* Michener, 1952:24. Type species: *Xenopanurgus readioi* Michener, 1952, by original designation. **Panurginae.**
- Xenopeponapis Hurd and Linsley, 1970:29. Type species: Melissodes crassidentata Cockerell, 1949, by original designation. [Peponapis]. **Eucerini.**
- Xenorhiza Michener, 1965a:146. Type species: Palaeorhiza hamada Cheesman, 1948, by original designation. [Palaeorhiza]. Hylaeinae.

- Xenoxylocopa Hurd and Moure, 1963:243. Type species: Mesotrichia chiyakensis Cockerell, 1908, by original designation. [Xylocopa]. **Xylocopini.**
- Xeralictoides Stage, 1981, in Michener, 1981:99. Type species: Hesperapis laticeps Crawford, 1917, by original designation. Dasypodinae.
- Xeralictus Cockerell, 1927a:41. Type species: Xeralictus timberlakei Cockerell, 1927, monobasic. Rophitinae.
- Xerammobates Popov, 1951:904. Type species: Ammobates oxianus Popov, 1951, by designation of the Commission, Opinion 1853 (1996). Ammobates biastoides Friese, 1895, designated as the type species by Popov, 1951, was misidentified (Baker, 1995b). [Ammobates]. Ammobatini.
- Xerocentris Snelling, 1974:3. Type species: Centris californica Timberlake, 1940, by original designation. [Centris]. Centridini.
- Xerocoelioxys Mitchell, 1973:44. Type species: Coelioxys edita Cresson, 1872, by original designation. [Coelioxys]. Megachilini.
- Xeroheriades Griswold, 1986:165. Type species: Xeroheriades micheneri Griswold, 1986, by original designation. Osmiini.
- Xeromacrotera Timberlake, 1954:412. Type species: Macrotera cephalotes Cresson, 1878, by original designation. [Perdita]. Panurginae.
- Xeromegachile Mitchell, 1934:302, 309. Type species: Megachile integra Cresson, by original designation. [Megachile]. Megachilini.
- Xeromelecta Linsley, 1939a:450. Type species: Bombomelecta larreae Cockerell, 1900, by original designation. [Melecta]. Melectini.
- Xeromelissa Cockerell, 1926a:221. Type species: Xeromelissa wilmattae Cockerell, 1926, monobasic. Xeromelissinae.
- Xeropasites Linsley, 1942:130. Type species: Townsendiella rufiventris Linsley, 1942, by original designation. [Townsendiella]. Townsendiellini.
- Xeropeponapis Hurd and Linsley, 1970:28. Type species: Peponapis timberlakei Hurd and Linsley, 1964, by original designation. [Peponapis]. Eucerini.
- Xerophasma Cockerell, 1923a:1. Type species: Xerophasma bequaerti Cockerell, 1923 = Perdita bequaertiana Cockerell, 1951, by original designation. Panurginae.
- *Xerosmia* Michener, 1943:81. Type species: *Osmia xerophila* Cockerell, 1935, by original designation. [Anthocopa]. **Osmiini.**
- Xilocopa Latreille, 1802a:432. Suppressed by Commission Opinion 743 (1965). See Xylocopa. Xylocopini.
- Xiphandrena LaBerge, 1971b:504. Type species: Andrena mendica Mitchell, 1960, by original designation. [Andrena]. Andreninae.
- Xylocopa Latreille, 1802b:379. Type species: Apis violacea Linnaeus, 1758, by designation of Westwood, 1840a:86. **Xylocopini.**

- Xylocopina Hurd and Moure, 1963:160. Type species: Xylocopa ruficollis Hurd and Moure, 1963, by original designation. [Xylocopa]. Xylocopini.
- *Xylocopoda* Hurd and Moure, 1963:105. Type species: *Xylocopaelegans* Hurd and Moure, 1963, by original designation. [Xylocopa]. **Xylocopini.**
- Xylocopoides Michener, 1954:155. Type species: Apis virginica Linnaeus, 1771, by original designation. [Xylocopa]. Xylocopini.
- Xylocopsis Hurd and Moure, 1963:124. Type species: Xylocopa funesta Maidl, 1912, by original designation. [Xylocopa].Xylocopini.
- Xylocospila Hurd and Moure, 1963:109. Type species: Xylocopa bambusae Schrottky, 1902, by original designation. [Xylocopa]. Xylocopini.
- *Xylomelissa* Hurd and Moure, 1963:219. Type species: *Xylocopa carinata* Smith, 1874 = *Xylocopa hottentotta* Smith, 1854, by original designation. [Xylocopa]. **Xylocopini.**
- Zacesta Ashmead, 1899a:73. Type species: Zacesta rufipes Ashmead, 1899, monobasic. Dasypodinae.
- Zacosmia Ashmead, 1898:282. Type species: Melecta maculata Cresson, 1879, by original designation. Isotypic with Micromelecta. Melectini.
- Zadontomerus Ashmead, 1899a:69. Type species: Ceratina tejonensis Cresson, 1864, by original designation. Ceratinini.
- Zalygus Cockerell, 1929b:321. Type species: Zalygus cornutus Cockerell, 1929, monobasic. Euryglossinae.
- Zaodontomerus Cockerell and Porter, 1899:406, unjustified emendation of Zudontomerus Ashmead, 1899. Ceratinini.
- Zaperdita Robertson, 1918a:91. Type species: *Perdita maura* Cockerell, 1901 = *Perdita halictoides* Smith, 1853, by original designation. Isotypic with *Perdita* by synonymy. **Panurginae.**
- Zarhiopalea Hirashima, 1982a:57. Type species: Palaeorhiza paradoxa Hirashima, 1975, by original designation. [Palaeorhiza]. Hylaeinae.
- Zebramegilla Brooks, 1988:502. Type species: Anthophora albigena Lepeletier, 1841, by original designation. [Amegilla]. Anthophorini.
- Zikanapis Moure, 1945a:147. Type species: *Ptiloglossa zikani* Friese, 1925, by original designation. **Caupolicanini**.
- Zikaniella Moure, 1941a:57. Type species: Zikaniella crassiceps Moure, 1941, by original designation. **Halictini.**
- Zonalictus Michener, 1978a:513. Type species: Halictus albofasciatus Smith, 1879, by original designation. Halictini.
- Zonalonia Moure and Michener, 1955b:250, 282. Type species: Eucera cearensis Ducke, 1910, by original designation. [Dasyhalonia]. Eucerini.
- Zonamegilla Popov, 1950b:260. Type species: Apis zonata Linnaeus, 1758, by original designation. [Amegilla]. Anthophorini.
- Zonandrena Hedicke, 1933:220. Type species: Andrena flavipes Panzer, 1799, by original designation. [Andrena]. Andreninae.

Zonohalonia Moure and Michener, 1955b:255, lapsus for Zonalonia Moure and Michener, 1955. [Dasyhalonia]. Eucerini.

Zonohirsuta Ma, 1938:300. Type species: *Xylocopa collaris* Lepeletier, 1841 (not *Apis collaris* Olivier, 1789) = *Xylocopa dejeanii* Lepeletier, 1841, by original designation. [Xylocopa]. **Xylocopini**.

Zonolonia Moure and Michener, 1955b:280, lapsus for Zonalonia Moure and Michener, 1955; the latter spelling was selected

by Michener and Moure, 1956:284, and is in accordance with the Code, 3rd ed., Art. 32(c)(ii). [Dasyhalonia]. Eucerini.

Zonomegachile Mitchell, 1980:72. Type species: Megachile mariannae Dalla Torre, 1896, by original designation. [Chrysosarus]. Megachilini.

Zosteranthidium Michener and Griswold, 1994a:310. Type species: *Nigranthidium tergofasciatum* Pasteels, 1984, by original designation. [Afranthidium]. **Anthidiini**.

SUPPLEMENT TO THE LIST OF FAMILY-GROUP NAMES

The authorship and dating of family-group names of bees were dealt with by Michener (1986a). These names, being coordinate at all levels (subtribe to superfamily), are attributed to the same author and date regardless of the rank and termination of the word [Code, 3rd ed., Art. 36a; also see Art. 11(f)(ii)]. Thus the Megachilini, Megachilinae, and Megachilidae all have the same author and date.

Since 1986, a few errors and omissions have been discovered. Moreover, a few new family-group names have been published. Below is a list of the additions and corrections, in the style of the earlier work, i.e., each entry consisting of the name, author, reference, type genus, and stem.

The items in the list are numbered in accordance with the system in the earlier list (Michener, 1986a). Thus, Item 30.1 could reasonably go after Item 30 in the earlier list, and such items are additions to the 1986 list. Items 3, 18, 79, 91, 112, and 123 are corrections rather than additional family-group names. They result from discovery of older usages than those cited in 1986.

- 3. Prosopiariae Fallén, 1813:32. *Prosopis*; stem: *Prosopid*–.18. See 3.
- 30.1. Perditinae Robertson, 1922:160. *Perdita*; stem: *Perdit*–.
- 30.2. Calliopsinae Robertson, 1922:160. *Calliopsis*; stem: *Calliops*–.
- 30.3. Anthemurginae Robertson, 1922:160. *Anthe-nurgus*; stem: *Anthemurg*–.
- 30.4. Protomeliturgini Ruz, 1991:215. Protomeliturga; stem: Protomeliturg—.
- 45.1. Oxystoglossini Schrottky, 1909b:482. Oxystoglossa; stem: Oxystogloss—. As pointed out to me by Michael S. Engel, this name has priority over Augochlorini. It has not been used since it was casually published in 1909. We will request that it be rejected by the Commission in the interest of stability of nomenclature.
- 79. Exomalopses Vachal, 1909b:7. Exomalopsis; stem: Exomalops—.
- 81.1. Ancyloscelina Roig-Alsina and Michener, 1993:159. *Ancyloscelis*; stem: *Ancyloscelid*–.

- 81.2. Tapinotaspini Roig-Alsina and Michener, 1993:159. *Tapinotaspis*; stem: *Tapinotaspid*—. The correct spelling is Tapinotaspidini. This tribal name was independently proposed by Moure, 1994b:306.
- 81.3. Paratetrapediini Moure, 1994b:306. *Paratetrapedia*; stem: *Paratetrapedi*—.
- 81.4. Teratognathini Silveira, 1995:449. *Teratognatha*; stem: *Teratognath*—.
- 85.1. Habropodini Marikovskaya, 1976:688. *Habropoda*; stem: *Habropod*–.
- 91. Melitomatae Vachal, 1909b:7. *Melitoma*; stem: *Melitom*–. (See below.)
- 101.1. Brachynomadini Roig-Alsina and Michener, 1993:157. *Brachynomada*; stem: *Brachynomad*–.
- 104.1. Hexepeolini Roig-Alsina and Michener, 1993:157. *Hexepeolus*; stem: *Hexepeol*–.
- 112. Neolarrini Fox, 1894:302, 304. Neolarra; stem: Neolarr-.
- 119.9. Eucondylopsinae Friese, 1909a:99, 439. *Eucondylops*; stem: *Eucondylops*–.
- 120.1. Manueliini Sakagami and Michener, 1987:439. Manuelia; stem: Manueli–.
- 123. Exaeretinae Cockerell, 1908a:41. *Exaerete*; stem: *Exaeret*–.
- 125.1. Eufrieseini Moure, 1944b:12. Eufriesea; stem: Eufriese-.

The proper name for the Emphorini has been a subject of discussion. The name proposed by Robertson (1904) based on *Emphor* is senior to the name based on *Entechnia* proposed by Cockerell (1906d) and the name based on *Melitoma* proposed by Vachal (1909b) (91 above). The name Entechniin has not been used in recent decades, presumably because *Entechnia* is a junior subjective synonym of *Melitoma*, and before 1961 the family-group name based on *Entechnia* would have been rejected for that reason (Article 5, International Rules of Zoological Nomenclature, Proceedings of the Biological Society of Washington 39:75–104, 1926). The current confusion concerns the names based on *Emphor* and *Melitoma* and resulted from the

fact that *Emphor* is a junior subjective synonym of *Ptilothrix*. Moure (1944c) proposed Melitomini without explanation, but Moure (1947b:240) stated that the replacement of Emphorini by Melitomini was necessary because *Emphor* had become a synonym of *Ptilothrix*. The Rules at that time (reference above) required replacement of a family-group name based on a genus name that was a junior synonym. However, as shown above, the name Melitomini dates from Vachal (1909b), who listed *Emphor* as an included genus.

The Code, 3rd ed., Art. 40(b), states that if a family-group name was replaced before 1961 because the genus on which it was based is a junior synonym, and if the replacement has won general acceptance, it is to be maintained. The name based on *Emplor* was replaced by that based on *Melitoma* by Moure in 1944. Since that date, the two family-group names have been used with almost equal

frequency; an incomplete list prepared by A. Roig-Alsina in 1996 shows 13 usages of Emphorini and 9 usages of Melitomini since 1944. However, most usages in the present decade (1990's) employed the name Emphorini. Thus, current usage seems to favor Emphorini.

It is preferable to have a family-group name based on an accepted genus rather than on a junior synonym, an argument that favors Melitomini. For this reason and because a replacement for the name Emphorini was in fact appropriate in 1944 when Melitomini was proposed by Moure, the matter remains contentious. A request for a decision submitted to the Commission elicited the response that Emphorini is the appropriate name and that there is no need to go to the time and expense of publication in the Bulletin of Zoological Nomenclature and evaluation and decision by the Commission.

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ADDENDUM

After this paper was in proof, Dr. Donald B. Baker (University Museum, Oxford) kindly sent me commentaries on certain dates of publication. Whereas I have usually used widely accepted dates, Dr. Baker has indicated that the following are correct:

Author, date	Corrected Date
Agassiz, L. 1846.	1847
Guérin-Méneville, F. E. 1830.	pp. 1–24, 1830; pp. 25–471, 1831
Heer, O. 1850.	1849
Lepeletier de S. Fargeau, A. L. M. 1836.	1835
Morawitz, F. 1873a.	1874
Radoszkowski, O. 1868.	1867
Schenck, A. 1866.	1867
Schenck, A. 1973.	1874
Smith, F. 1858.	pp. 42–88 and pls. 1, 2, 1857; pp. 89–180, 1858
Spinola, M. 1838.	1839
Vachal, J. 1899.	1900

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